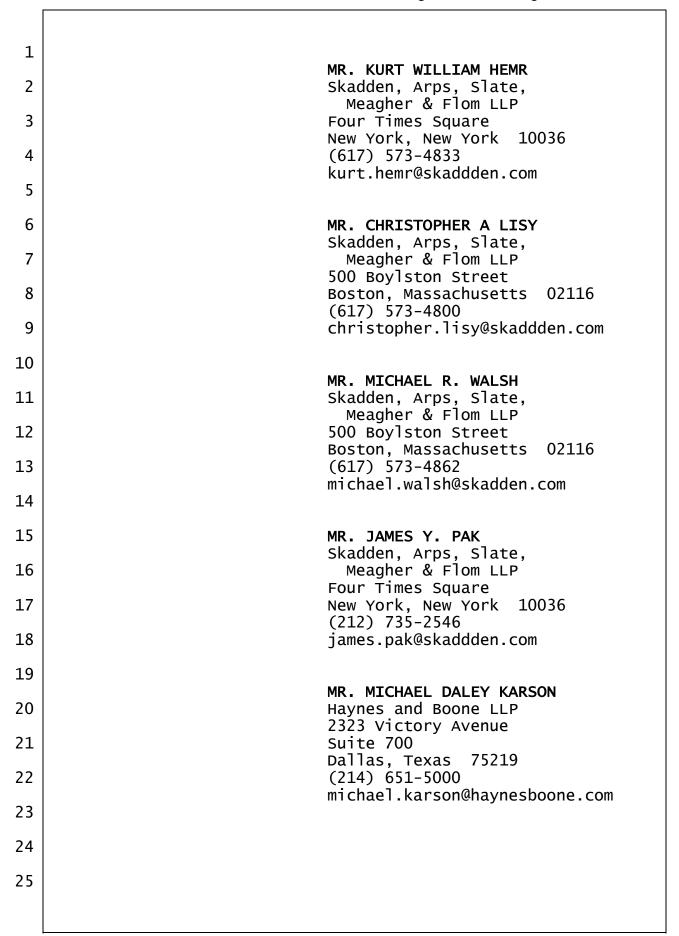
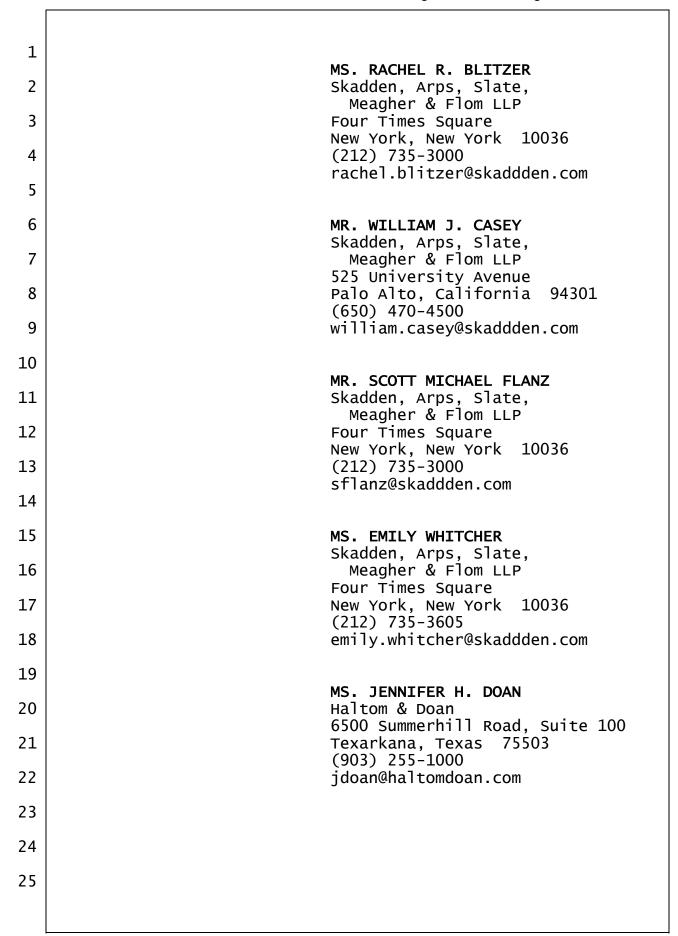
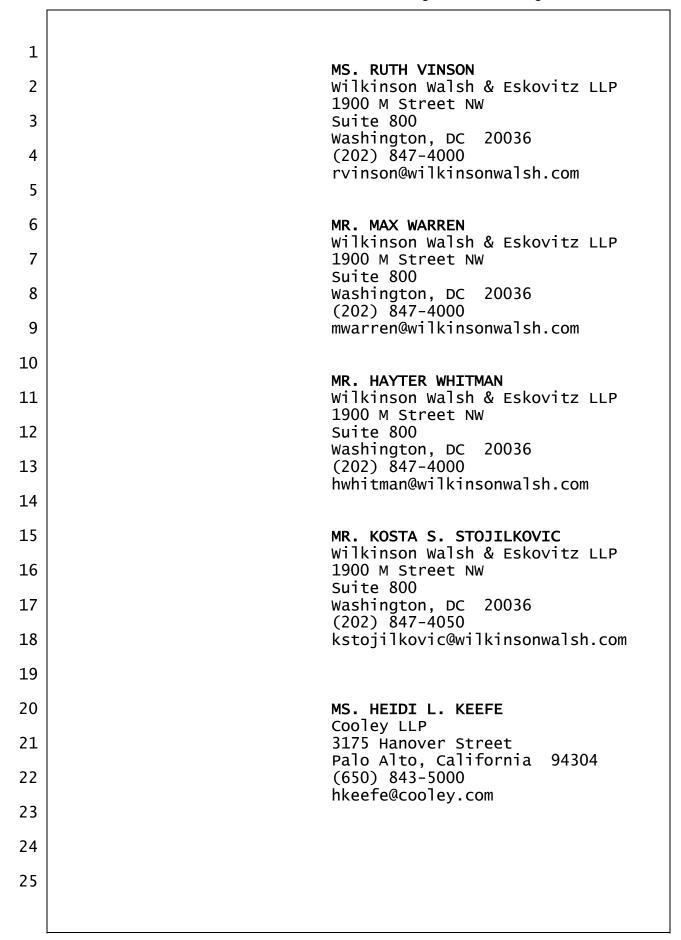
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                   IN THE UNITED STATES DISTRICT COURT
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                    FOR THE NORTHERN DISTRICT OF TEXAS
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                              DALLAS DIVISION
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                                            3:14-CV-1849-K
    ZENIMAX MEDIA INC. and ID
    SOFTWARE LLC
 6
                  Plaintiffs,
 7
    VS.
 8
                                            DALLAS, TEXAS
9
    OCULUS VR, LLC, PALMER
    LUCKEY, FACEBOOK, INC.,
    BRENDAN IRIBE and JOHN
10
    CARMACK.
11
                   Defendants.
                                            January 17, 2017
12
13
                   TRANSCRIPT OF JURY TRIAL, VOLUME 6
14
                    BEFORE THE HONORABLE ED KINKEADE
15
                       UNITED STATES DISTRICT JUDGE
16
17
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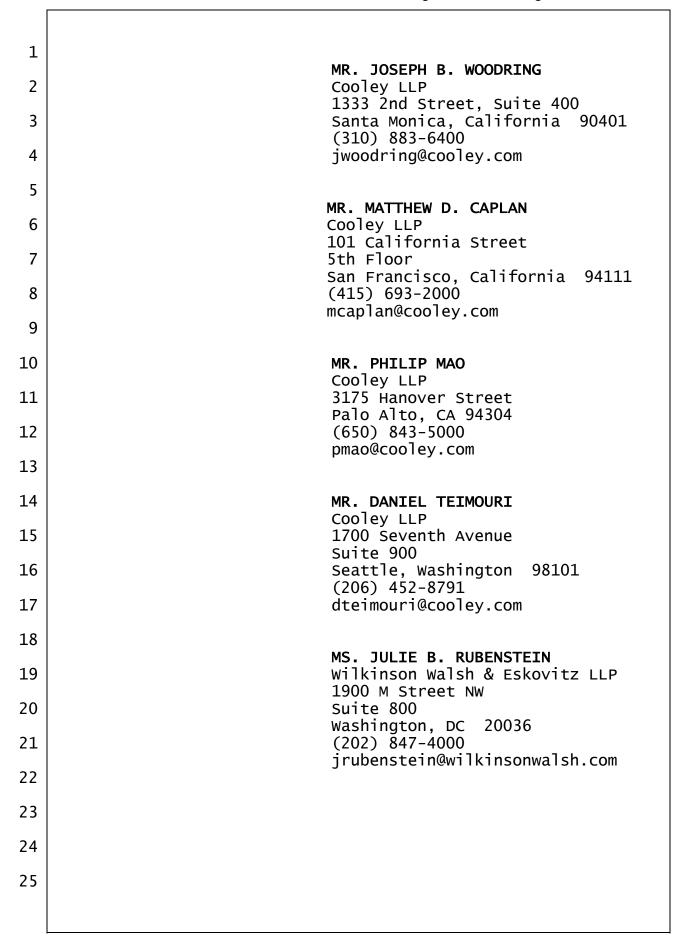




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23	Proceedings reported by mechanical stenography and	
24	transcript produced by computer.	
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                  JURY TRIAL - JANUARY 17, 2017
 2
                      PROCEEDINGS
 3
              THE COURT: Okay. Here we go. Everybody get a good
    1unch?
 4
 5
              MS. WILKINSON: Yes.
              MR. SAMMI: Yes, sir.
 6
 7
              THE COURT: We did? Okay. We did, too.
 8
              If y'all haven't been to that off-site kitchen, it's
    a good place, for y'all out-of-towners. It's kind of a --
9
10
    well, what's that little area?
11
              what's that area called we go to over there, you
    know, that has all those experimental --
12
13
              THE CLERK: Trinity Groves.
              THE COURT: The Trinity Groves area. It's really
14
15
           I think they have free rent, where they are, but it's
    good.
    good. It's a good place.
16
17
              Okay.
18
              MR. SAMMI: Your Honor, I'd like to put something on
19
    the record.
20
              THE COURT: What?
21
              MR. SAMMI: Just very briefly.
22
              THE COURT: Go ahead, Mr. Sammi.
23
              MR. SAMMI: Thank you, sir.
24
              we'd like to put on the record Plaintiffs' continuing
25
    objection to the Court's prior ruling excluding PX81. That is
```

```
1
    an indemnity agreement that's --
              THE COURT: Oh, yeah. And I do remember all of your
 2
    objections --
 3
 4
              MR. SAMMI: Yes, sir.
 5
              THE COURT: -- that you've made for purposes -- and
    that you have timely made those, and you have requested on
 6
 7
     numerous occasions, and I told you to keep -- if you wanted to
 8
     keep trying, trying, that maybe it would get opened up.
                                                              But I
9
     don't think so yet.
10
              MR. SAMMI: Your Honor, we have --
11
              THE COURT: But you have another reason you think
12
    it's opened up?
13
              MR. SAMMI: We do.
              The indemnity agreement discredits the testimony of
14
15
    both Mr. Carmack and Mr. Zuckerberg. In that regard,
    Mr. Carmack was aware of the agreement and Mr. Zuckerberg
16
17
    testified at his deposition that he was aware of that
18
    agreement.
19
              THE COURT: Okay.
20
              MR. SAMMI: And that agreement, the indemnity relates
21
     directly to ZeniMax's concerns -- claims regarding virtual
22
     reality technology.
23
              THE COURT: Okay. I'm not changing my ruling yet,
24
    but be persistent.
25
              MR. SAMMI: I am, Your Honor.
                                              I am.
```

```
THE COURT: I know. I've noticed. It's okay.
 1
              All right. Are you ready?
 2
              Did you figure out your microphone thing?
 3
              MS. WILKINSON: I did, Your Honor.
 4
 5
              THE COURT: Okay.
              MS. WILKINSON: Thank you.
 6
 7
              THE COURT: All right. Let's bring the jury in.
 8
              Did you get lunch, Mr. Zuckerberg?
9
              THE WITNESS: I did.
10
              THE COURT: Okay. Do you have water still?
11
              THE WITNESS: I do.
12
              THE COURT: Okay. Good.
13
              (Pause)
14
              THE COURT: David, hold up a sec. Hold it one sec.
15
              No, it's okay. Go ahead and bring them in.
16
    ready. It's all right.
17
              SECURITY OFFICER: All rise for the jury.
18
              (Jury panel in)
19
              THE COURT: Y'all be seated. Hope you enjoyed that
20
    barbecue. Sammy's really good, isn't it? I knew it. I knew
21
    it.
22
              Okay, Ms. Wilkinson.
23
              MS. WILKINSON: Thank you, Your Honor.
24
              THE COURT: Thank you.
25
              Good afternoon, everyone.
```

```
1
    BY MS. WILKINSON:
 2
       Mr. --
    Q.
              THE COURT: I don't think you're on. You were into
 3
    the second verse of your song. You didn't have your microphone
 4
 5
    on, Ms. Carey.
              MS. WILKINSON: Oh.
 6
 7
              THE COURT: Oh. That's not nice. I'm sorry.
 8
              MS. WILKINSON: It's still not working.
 9
              THE COURT: Did you get it turned on now?
10
              MS. WILKINSON: I may need assistance. There we go.
11
              THE COURT: You're good.
12
              MS. WILKINSON: Ms. Nelson keeps me straight. All
13
    right.
              THE COURT: Pull it down just a hair. There you go.
14
15
    There you go. That's fine.
16
              MS. WILKINSON: Good? Sorry.
17
    BY MS. WILKINSON:
         Mr. Zuckerberg, before we broke this morning, we were just
18
19
    about to turn to how you first found out about Oculus.
20
              Do you recall getting an email sometime in November
    of 2013 from Mr. Andreessen?
21
22
         Yes, I think we discussed this earlier.
    Α.
         Okay. Take a look at Plaintiffs' Exhibit 1288, if you
23
    Q.
    could.
24
25
              We're going to put it up on the screen. It was one
```

- 1 Mr. -- I don't know if Mr. Sammi gave you a copy, but I will give you a copy.
- MS. WILKINSON: Your Honor, may I approach?
- 4 THE COURT: Sure.
- 5 (Pause)
- 6 BY MS. WILKINSON:
- 7 | Q. Now, just so we can get the timeline right for everybody,
- 8 at this time, November 5, 2013, was Mr. Andreessen on the face
- 9 | board -- Facebook board?
- 10 | A. Yes.
- 11 | Q. All right. And had he invested at Oculus at this time?
- 12 A. No.
- 13 Q. All right. Go down to the bottom of this email to the
- 14 | section you weren't shown during your testimony.
- 15 Read that last sentence --
- 16 A. I don't think so. He -- there may have been a seed round,
- 17 but I'm not sure.
- 18 | Q. Okay. Take a look at the last sentence that says "I
- 19 might." If you could, just read that out loud if you wouldn't
- 20 mind.
- 21 A. Sure.
- "I might ask you for a quick reference call/email
- 23 with the CEO. We are proposing investing, but beyond that, you
- 24 | would really enjoy seeing it. It was a new experience."
- 25 Q. All right. Can you explain to us what a reference call is

1 in this context?

- A. Sure. So Marc Andreessen was on the Facebook board of directors, and he was -- he is a valuable director to the company. He provides good advice. He helps us govern and run the company. And as part of investing, you know, a company like Oculus that is perceived to be a good option for investors has a lot of options for -- a lot of investors are going to want to try to invest in a company like that.
 - So Andreessen was trying to see if I could talk to Brendan to tell Brendan about my experience with Marc on Facebook's board, because he thought that would help Brendan choose Marc as the investor in Oculus over others.
- Q. Okay. So does this refresh your recollection of whether
 Mr. Andreessen was an investor at this time in November of
 2013?
 - A. Again, I don't think he was. I mean, this is a factual thing that we can check otherwise, but frequently these companies have multiple rounds of funding. It's possible that they did a small round up front, but my -- my guess from this and my understanding and what I remember is that he had not invested at this point and certainly hadn't made the big investment that they did after this.
- Q. Okay. When he's asking you if you'll do a reference call, first of all, did you agree to do that?
- 25 | A. Yes.

- 1 Q. All right. And is this like a tryout? Could Mr. Iribe
- 2 have said, "We don't want your money. We'll take someone
- 3 else's money"? Is that the idea?
- 4 A. Yes. I mean, he and the company have whatever choice they
- 5 | want of who they wanted to invest, and as a good company, I
- 6 think that they had a lot of options for investors, including a
- 7 lot of people who were Andreessen's competitors who were also
- 8 good investors.
- 9 Q. When you say Mr. Andreessen was on your board, was that
- 10 his full-time job in November of 2013?
- 11 A. No.
- 12 Q. What was his full-time job?
- 13 A. He runs an investment firm called Andreessen Horowitz with
- 14 his partner Ben Horowitz, and they've invested in a lot of
- 15 companies. And he is on the board of, I think, probably five
- 16 companies.
- 17 Q. Has he ever formed a company himself?
- 18 A. Yes. Earlier in his career he created Netscape, which was
- 19 the first internet browser, right? So what -- you know, you
- 20 might use Chrome or Apple Safari or Internet Explorer today.
- 21 Netscape was, you know, one of the first of those as a company.
- 22 Q. Do you find him to be a knowledgeable source about
- 23 technology and technology investments?
- 24 A. Yes.
- 25 Q. Let's take a look at DX448, if you could. That should be

- 1 in your binder up there. The index will tell you where it is.
- 2 It is DX448.
- 3 | A. Okay.
- 4 Q. Do you see that?
- 5 A. Yes.
- 6 Q. Is that an email from you?
- 7 | A. It is.
- 8 Q. On what date?
- 9 A. November 19.
- $10 \mid Q$. To whom?
- 11 A. To Andreessen.
- 12 Q. And what do you tell Mr. Andreessen in this email? You
- 13 can just -- we can focus on the second paragraph, if we could.
- 14 A. I'm telling him that I did the reference call with
- 15 Brendan.
- 16 Q. All right.
- 17 A. And that on the call Brendan seemed convinced that
- 18 Andreessen would be a helpful and a good investor.
- 19 Q. So in November of 2013, were you considering to be an
- 20 investor -- you, Facebook -- at that time, or just
- 21 Mr. Andreessen?
- 22 A. No, we were not.
- 23 Q. Okay. So I'm going to use MA for Mr. Andreessen, the
- 24 investor. Okay?
- Did Mr. Iribe invite you to come see their

- 1 technology?
- 2 A. I think so, and I think what we discussed was that I would
- 3 see it the next time he came to the San Francisco Bay area.
- 4 Q. Okay. Did there come a time when he did set up a meeting
- 5 | with you to show off the Oculus Rift?
- 6 A. Yes. I think it was the next time that he was in the
- 7 area.
- 8 Q. All right. And do you recall what -- what time period
- 9 that was? Was it in January of 2014 or February?
- 10 A. Yes. I think it was January, a couple of months after
- 11 this.
- 12 | Q. All right. And -- do you remember the demonstration
- 13 | itself, where it was at Facebook and what happened?
- 14 A. I remember some things about it. It was --
- 15 Q. Let's start with where -- where it was.
- 16 Just tell the jury a little bit about how Facebook is
- 17 | set up.
- Do y'all have private offices or how do you have it
- 19 | laid out?
- 20 A. Sure. So we're set up so that everyone sits at a desk out
- 21 in the open, including me. So no one has a private office that
- 22 | they work in. Although we -- we do have meetings room, right,
- 23 because people need to have meetings that are private. And
- 24 | since I'm in meetings a lot of the time and Sheryl Sandberg,
- 25 our COO, was in meetings all the time, some of the senior

- executives have rooms that are reserved for meetings. And I
 think that the first meeting that we had with Brendan we did -I don't remember why this was, but I think it was in Sheryl's
- 5 Q. Do you recall who else was at the meeting?
- A. I remember being -- after I saw the first couple of demos, thinking that this was so important for some other folks to see, that I remember pulling in our chief technology officer.
- 9 Q. Who is that?

conference room.

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A. Mike Schroepfer and our chief product guy, Chris Cox. And I remember at least trying to go pull them in, and I think that they were both there. One of them might have been out of town that day, but I remember them both coming in.

There's also a person named Cory Ondrejka, who I don't know if he was there for that specific meeting, but he was pretty key in doing all of the technical diligence that we started doing and trying to learn about the virtual reality field which that meeting really kicked off and started for us.

- Q. Do you recall what you saw in the Oculus headset, what content was in there when you were getting the demonstration?
- A. There were a few things. One of the demos that really
 made an impression was there was this demo of a villa in
 Tuscany in Italy, and I remember thinking that this was really
 neat because I was sitting in a chair. And you can move
 around, and as you move around, it like -- I'm just like in

real life. When you move, you see a different thing.

In this situation when you moved around with this headset on, it -- you really felt like you were there. It moved around exactly naturally how your head would move. And I just remember feeling from that, okay, this is really cool. I'm clearly not in Italy right now. I'm in this conference room and I'm in California. But I almost have to convince myself that I'm not in Italy because everything that I'm seeing just makes it feel like I'm there, which is a really new experience, right, if you think about that.

It sounds -- you know, a lot of times if you're watching, you know, a basketball game on TV or a football game or you're playing some video game, it's on a screen and you're trying to convince yourself that it's real or you're a part of it, but because it's on this 2D screen, you kind of have to project and put yourself into that scene.

This was the opposite experience, right? You kind of know that you're wearing this headset, and it's a screen, but everything in your body tells you that it's real and you're there, which is a pretty magical and cool experience.

Now, it wasn't perfect, but there were clear things that needed to get worked out. You know, the early demos, because it wasn't -- it didn't move around perfectly, you would kind of feel motion sickness after using it for a little while. So there was a lot of technology that needed to get built.

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But I remember from that initial demo thinking, hey,
I have been thinking about VR for a long time, and I just
didn't realize -- I wasn't sure when it was going to be
possible to build something like this, and this seems to be
close enough that it's worth trying to look into whether we
should do more and invest in this now.
         And that's what kicked off this process when I pulled
together Schroepfer and Chris Cox and Cory and Amin, our head
of our corporate development, to say, hey, this is something
that we should look into, go out there, see who is out there,
go get more demos, see what this company is doing, meet the
people, see who the best people are in this field, and see if
it is time for us to go do something here.
     Okay. Did you look over some slides and ask us to prepare
some demonstratives you've given, some demonstratives that you
saw?
     Did I do that?
Α.
     Or review before we came to court?
Ο.
     It depends on which ones they are.
Α.
         THE COURT: Wait, wait. Mr. Sammi.
         MR. SAMMI: Objection, Your Honor. I think the
witness has already said that he's not sure what -- I've never
seen this. May I see -- see a copy --
         THE COURT: Sure.
         MR. SAMMI: -- at least?
```

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1
              MS. WILKINSON: You can have the copy. I just wanted
    to show Mr. --
 2
 3
              MR. SAMMI: Sure. Sure. I would like one too.
              MS. WILKINSON: -- Mr. Zuckerberg here. I have
 4
 5
    another one.
              Your Honor, may I approach and give this to
 6
 7
    Mr. Zuckerberg?
 8
              THE COURT: Yes.
 9
              Let me know what your objection is.
10
              MR. SAMMI: Yes, I will, once I --
11
              MS. WILKINSON: Your Honor, I thought we weren't
    going to show the 3D version, so these are just stills of what
12
    he just described.
13
14
              MR. SAMMI: Okay.
15
              THE COURT: Are these demonstratives? Are you
    offering them in evidence?
16
17
              MS. WILKINSON: Just demonstratives, Your Honor.
18
              MR. SAMMI: Your Honor, may I maintain a relevancy
19
    objection to the issues in the case?
20
              THE COURT: Wait. I missed that.
                                                 I'm sorry.
21
              MR. SAMMI: Maintain a relevance objection.
22
              THE COURT: Relevance.
23
              MR. SAMMI: Yes.
              THE COURT: Okay. Overrule your objections.
24
25
              MR. SAMMI: Okay.
```

- THE COURT: It is admitted for demonstrative purposes only, ladies and gentlemen.
- 3 BY MS. WILKINSON:
- Q. Mr. Zuckerberg, did you just describe for us the scene you saw in the Oculus Rift headset?
- 6 A. Yes. And I mean, these are shots that are taken from it,
- 7 but it really doesn't do it justice. I think you have to
- 8 experience it in VR to get a sense of -- because you can look
- 9 around and it feels like you're there, and that's -- there is
- 10 | something to that experience that you can't quite capture on a
- 11 | 2D screen like this, but I do think these are screens that are
- 12 | taken from that experience.
- Q. Okay. So in January you had a demonstration, including of this Tuscany scene.
- Would that be fair to say that's one of first times

 you considered actually investing or buying Oculus?
- 17 A. Yeah, I think that's right.
- 18 (Pause)
- 19 Q. All right. Let's talk about what you did after you -- I
- 20 think you told us after this demonstration, you called in the
- 21 other guys. And did they get to do a demonstration as well?
- 22 A. Those who were there that day.
- 23 Q. All right. What was the next step that you took after you
- 24 saw this demonstration?
- 25 A. So after talking to the team and caucusing on that, you

- 1 know, Brendan brought a demo to Facebook, which is where this
- 2 demo was, but it wasn't the most up-to-date, state-of-the-art
- 3 experience that they were building, and in order to get that,
- 4 | we had to go down to their headquarters because what they had
- 5 | they couldn't transport yet.
- 6 And it was pretty clear after seeing this that this
- 7 | is pretty neat, but there were also a bunch of issues with it.
- 8 | So it was worth seeing what the most state-of-the-art thing
- 9 that they built was.
- 10 | We planned a trip -- I think it was pretty soon --
- 11 | within a week or two, to go down to, I think, Irvine where the
- 12 headquarters were for Oculus to go see the most recent
- 13 prototype that they built.
- 14 Q. Did you go yourself?
- 15 A. Yes.
- 16 | Q. Who else went with you, if you recall?
- 17 A. Cory and Amin, and I don't know if anyone else went.
- 18 | Q. Do you recall if you also shared a meal with Mr. Iribe and
- 19 other folks after the demonstration that day?
- 20 A. We were in Oculus's headquarters, so there may have been
- 21 | some food around, but we didn't -- it wasn't a long meal, if it
- 22 was a meal.
- 23 | Q. All right. And can you describe for us the demonstration
- 24 | that you saw down in Irvine?
- 25 A. Sure. So that was a much higher fidelity, more accurate

experience. So what's the best way to describe this?

So the demos themselves, I mean, the content, there were a few different things. They had a demo where there was a T. Rex. It was pretty cool. The T. Rex is walking around and it kind of looks at you and roars at you, all right, and you kind of actually tremble a little bit and think -- you know, in your mind, you are like, all right, there is clearly not a T. Rex here, I know that, but it really just -- you know, it feels very real, and the sound is very real.

You know, there's a demo where you're standing on the edge of a building, and you can take steps over to the edge, and, again, you know this is -- this is obviously not real, it is just in a computer, but you actually feel -- I don't know -- what's that -- vertigo when you step to the side because it feels so real that it's, like, all right -- this is -- this is kind of a different experience than anything you would have with normal TV or anything like that.

So there were a few demos like this.

But in order to give you this feeling of presence, like you're really there, it has to be a high fidelity experience. It can't be jittery, you know, it can't be slow, it can't be that when you look around stuff lags, all right, because all that stuff breaks the illusion that this is a real virtual reality, right?

And all that stuff -- all those errors just kind of

help make you snap out of it and go this isn't actually a real experience.

So the difference between the first demo that I saw and what I saw down at Oculus headquarters was, it was faster, it made you less motion sick, it felt more real, but it also wasn't perfect yet. So, I mean, that wasn't the exact thing that we ended up shipping.

You know, I think it took another couple of years from that point to actually get to a product that we ended up shipping as a consumer product because there was a lot more that needed to work. And, again, that was just, like, the first product that we shipped, right, kind of like the earliest version of a BlackBerry smartphone. It's not, you know, the iPhone version that we want to get towards building.

But through all these experiences, I basically came away with the belief that now it was possible to build a good VR experience over the next five years or ten years if we invested a lot in that, whereas, before I had seen these, I wouldn't have known whether it was, like, 50 years away. I mean, it wasn't clear what the -- you know, what technology needed to be built before this could be something that -- that you could then go take into building something that would be an affordable product that people could get and be happy with.

Q. Did you and Mr. Zoufonoun talk about proposing a deal to Oculus at some point around the time of this demonstration down

- 1 in Irvine?
- 2 A. Yes.
- 3 | Q. All right. Did you --
- 4 A. Part of what we wanted to do was -- you know, different
- 5 entrepreneurs and founders think about their companies in
- 6 different ways. You know, some aren't willing to sell their
- 7 companies under, you know, any circumstances. I didn't. A lot
- 8 of companies wanted to buy Facebook early on. And then some
- 9 are open to it if it's a good deal, and some really want to
- 10 sell their companies.
- 11 And then there is --
- 12 | Q. Where would you put Mr. Iribe and the folks at Oculus on
- 13 | that scale back in January?
- 14 A. They definitely weren't in the "really want to sell our
- 15 company," which is why I think it took awhile to come to terms
- 16 and it ended up being so expensive.
- 17 But they also clearly were not in the "we would never
- 18 sell." So they were closer to that.
- 19 This team, which I think you can probably get from
- 20 | their testimony -- I don't actually know which ones have
- 21 testified yet and which ones will to come -- I mean, they
- 22 really care about virtual reality. This is going to be, like,
- 23 | their life's work. When you look back 10, 20 years from now, I
- 24 | think that that's going to be the thing that they are most
- 25 proud of in their lives is they built this experience and

1 | contributed to this.

So, you know, I think that they were open to considering a deal but only if we could convince them that this was actually going to be really good for VR and not just a good deal for their company.

All right. So if it was just going to be money they were going to get but then they were going to have to walk away from their dream of building this, I don't it couldn't have happened. And you can, of course, ask them about this when they -- when they testify.

But that -- that, I think, ended up being -- most of what we actually talked about was not the price of the deal but how was Facebook, this social networking company that, frankly, people really did not think about VR before -- before we started talking to these guys, how were we going to help them realize their dream of building virtual reality.

And that was the conversation over the next couple of months that eventually led to the deal coming together.

Q. Let's take a look at DX489, which is also in your notebook, and start at the back if we could.

MS. WILKINSON: First of all, let's go up to the top. I'm sorry. Sorry, Dave. Can we go back? Just to lay the foundation up at the top.

24 BY MS. WILKINSON:

O. Who is this email from?

- 1 A. Amin.
- 2 Q. And, again, tell the jury who he is.
- 3 A. He was the head of corporate development. So he worked on
- 4 these kind of deals for us.
- 5 Q. You call him the -- you called him the deal guy? He helps
- 6 get deals done if you --
- 7 A. Sure.
- 8 Q. Okay. What date is this email?
- 9 A. January 31, 2014.
- 10 Q. All right. And who's on the cc line?
- 11 A. Andrea Besmehn.
- 12 | Q. Who is she?
- 13 A. She is my executive assistant.
- 14 | Q. Great.
- And it says "Project Inception." What does that
- 16 | mean?
- 17 A. That was the code word for the project that, I think, Amin
- 18 and the team has chosen.
- 19 Whenever we are doing projects, the team always comes
- 20 up with code words. So that way, you know, we're not talking
- 21 about Oculus. If something leaked, for example, then, you
- 22 know, people wouldn't know that -- you know, that we were
- 23 talking about Oculus, the company. It would just be some code
- 24 | word that people wouldn't know what it was.
- 25 Q. Explain to us why would you care. You are thinking about

buying Oculus, right? This is when you are starting to think about putting together a strategy.

Why would you care if somebody out in the public found out you were trying to buy Oculus or any other company?

A. Oh. Because these deals are competitive. Right? We talked a second ago about how when Marc Andreessen wanted to invest, he was up against other competitive investors who wanted to invest. There is a similar dynamic if a company like us is to buy another company.

So, you know, I gave some testimony before around why we moved so quickly during the deal, and part of that is because when you're doing -- when you're making deals and it is a competitive situation, you often don't have a lot of time.

Right?

I mean, some of the bigger acquisitions that we have done, like Instagram and WhatsApp, which were each more than a billion dollars, we had to move very quickly because other companies -- whether it was Google or, you know, Twitter or Apple, or whatever the companies were -- were also trying to talk to those companies and buy them. And, often, if a company knows that we're offering something, they will offer more, so being able to move quickly not only increases our chance of being able to get a deal done if we want to, but it makes it so we don't end up having to pay a lot more because the process drags out. So that's a really important thing. I mean, you

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want to make -- you want to take the time to evaluate this carefully and meet all the people involved and come to a clear understanding that this is a company and these are people that we want to work with. But you want to do that as quickly as possible so it doesn't get taken from -- out from under you by a competitor. Got it. Q. Now, Mr. Zoufonoun is forwarding you this email. MS. WILKINSON: Can we go to the bottom, please, where the email starts? I think it is the second page, Dave. So start from the bottom. His Honor has noted that maybe if you could change the way emails are read, we would all appreciate it. It's hard for us to start at the bottom and read up. So go down to the bottom, please. THE COURT: I'm going to invent that. MS. WILKINSON: It is hard. Well, you have him here. Maybe he can do something about it. THE COURT: Okay. MS. WILKINSON: Keep going down, please. Keep going. There we go. Thanks, Dave. BY MS. WILKINSON: Right there. This first email, are your folks talking Q. about a strategy of how to get Oculus to do the deal with you?

- 1 A. So I want to be clear that I'm not on this email.
- 2 Q. Right. This is forwarded to you at the end, and I
- 3 | think -- doesn't Mr. Zoufonoun tell you at the beginning for
- 4 | you to read it yourself from the bottom of the thread?
- 5 A. Sure.
- 6 Q. Look at the front.
- 7 A. So -- yes. So Amin is involved in both making these deals
- 8 | and then also making sure that they are successful, which is
- 9 | why I pushed back a little bit on the characterization of him
- 10 just as a deal guy because that makes it sound like he's just
- 11 trying to get something done, whereas he also is deeply
- 12 involved in actually making them work once -- once the
- 13 companies join Facebook.
- 14 Yeah, I think what he's saying here is basically what
- 15 | I was saying a few minutes ago, that, you know, getting -- if
- 16 this is going to happen, it is not going to be because we just
- 17 offer a lot of money, although we're going to have to offer a
- 18 fair price for the company that is more than -- than what they
- 19 potentially could -- felt like they could do on their own. But
- 20 they also would need to feel like this was actually going to
- 21 | help their mission -- right? -- and help virtual reality get
- 22 built in the world and that if -- if coming to Facebook was
- going to jeopardize that, then they were weren't going to do
- 24 | that.
- 25 So, you know, he felt after his interactions with

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    them, which I agreed with even though I wasn't on this thread,
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    that the most important thing was aligning and getting excited
    about a shared vision about how we were going to work together
 3
    or if they built the hardware and we built the experiences, how
 4
    that could be better than either of us working separately.
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         Did you also share the belief that you should instill fear
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 7
    or trepidation in them about staying independent?
         Yeah. That's less my thing, but -- but I think if you are
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    Α.
9
    trying to get -- if you are trying to help convince people that
10
    they want to join you, helping them understand all the pain
11
    that they would have to go through to build it out
    independently is a valuable tactic. But that's, I think, a
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    little less what I focused on than just what we could just do
14
    together.
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              MS. WILKINSON: Let's go back to the top of that
    document, the first page, please.
16
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              And does Mr. Zoufonoun share his strategy there, what
    he thinks is the best strategy in the second paragraph there,
18
19
    "I still think"?
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              MR. SAMMI: Objection, calls for speculation.
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              THE COURT: Let's see. What you're saying is you
22
    think his answer calls for speculation?
23
              MR. SAMMI:
                         Yes.
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              THE COURT: On the deal?
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              MR. SAMMI: Yes, sir. She's asking the witness what
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- he means. She can ask his understanding, but -
 MS. WILKINSON: I'll rephrase it, Your Honor. I

 don't mind.

 THE COURT: Okay. Good. It saves me from having to

 make a ruling.
- 6 BY MS. WILKINSON:
- Q. Mr. Zuckerberg, what's your understanding of this expression of strategy from Mr. Zoufonoun?
- 9 Α. well, this looks like, just from reading it now, very 10 similar to the last email that you showed me where he's arguing that the only way that this ends up happening is if the Oculus 11 team is so excited about what we could do together beyond what 12 they could do independently that it would be better for VR. At 13 that point, we could discuss numbers and financials around the 14 15 deal, but we weren't going to -- you know, the thing that was 16 going to get this done wasn't have it be a -- only have it be a 17 big number. It was really a lot about the alignment of the vision and what we're trying to build together. 18
- 19 Q. Okay. We're going to go down to the next email.
- Can you tell us the name of the person who wrote this email. this part of the email?
- 22 A. Anantha Kancherla.
- 23 Q. Okay. And what does he do at Facebook?
- A. I don't think he's at Facebook now, but he -- at the time

 he was an engineer there.

- 1 Q. All right. And do you rely on some of the other people
- 2 | who work for you to assess the technical issues associated with
- 3 deals including the one technical issues associated with
- 4 Oculus?
- 5 A. Yes.
- 6 Q. All right. Take a look down where it says "their key
- 7 technical folks."
- 8 Is he giving you-all an assessment -- what did you
- 9 understand him to be saying there about who were the key
- 10 technical folks at Oculus?
- 11 | A. Well, he seems to be listing out who some of the key
- 12 technical leaders are.
- 13 | Q. Do you know who Nirav is?
- 14 A. Yes.
- 15 Q. Did you meet with him before you closed this deal?
- 16 A. Yes.
- 17 | Q. Do you know who Michael is?
- 18 A. Yes.
- 19 Q. Did you meet with him before you closed this deal?
- 20 A. Yes.
- 21 Q. And Mr. Carmack, you've already told us about, right?
- 22 A. Yes.
- 23 | Q. Do you know what he means by "a couple of vision Ph.D.'s
- 24 | worth preserving"?
- 25 A. Yes.

- 1 | Q. What does he mean? What did you understand him to mean?
- 2 A. Ph.D. -- right? -- so people who had gotten an advanced
- 3 degree in computer vision, right? So that's --
- 4 Q. What is computer -- it's obvious to you, but again, to us,
- 5 | what is Ph.D. in computer vision --
- 6 A. It's --
- 7 Q. -- or what is computer vision?
- 8 A. It's software that helps a computer see things. It's --
- 9 Q. Oh, that's obvious.
- 10 A. I'm sorry. For example, like face recognition, right?
- 11 | It's -- you know, when you upload a photo to Facebook and we
- 12 | can suggest whether it's a friend of yours in it, because we
- 13 understand that it's their friend by looking at it, that's an
- 14 example of computer vision.
- In the case of this, computer vision is really
- 16 | important, because you have this headset on and you're looking
- around the room, and one of the key things that you're doing is
- 18 you have to track what the person's head position is. And one
- 19 of the ways that you can do that accurately is by having a
- 20 camera in front of the person that then looks at them and tries
- 21 to determine when they're moving around in space, right?
- That's much more accurate than just having a
- 23 gyroscope or something on the device itself, so that is a
- 24 computer vision problem. And we needed the best computer
- 25 | vision Ph.D.'s and experts in the world to build this

1 technology. 2 All right. Go down to -- two bullets down where it says "The hardest" -- you've just described tracking. It says, "The 3 hardest nontracking work they're doing is what Carmack is doing 4 with the Android." 5 what do you understand that to mean? What is 6 7 nontracking work? So tracking -- sorry. Tracking is what I was just 8 Α. 9 referring to, so basically knowing as you move your head around 10 and as you walk through space, what your position is, because, you know, what the world is that you see is, of course, going 11 12 to be dependent on what your position is, right? So if I'm looking this way, I'm going to see this. If I looking this 13 way, I'm going to see this and all the variants in between. 14 15 The rest of the work is -- you could call it systems 16 work. So it's -- so imagine this technical problem, right? So 17 you turn your head 10 degrees, right? And now you're looking at a different place. And your eyes get a new image --18 19 right? -- like, in the real world, within 5 or 10 milliseconds, 20 right? So really quickly. 21 So that means that in order for virtual reality to 22 work, we need to build software that can know that you moved, know what the image should be, and then send it to the screen 23 24 within 5 or 10 milliseconds or else you're going to get motion 25 sick -- right? -- and it's not going to be a good experience.

- So that just requires a lot of optimization and making that go quickly, and that, if you follow Carmack's work, is one of the things that he is a world expert at, among other things.
- 5 Q. And --
- A. So that was one of the hardest problems here, is not just doing the tracking of knowing where the person is in space, but also being able to then go render that image really quickly for the person.
- 10 Q. It says, "Carmack is doing Android." We've heard
 11 testimony that Mr. Carmack worked on mobile when he came to
 12 Oculus.
- Was that what you understood when you spoke to him?
- 14 | A. Yes.
- Q. And is doing work on mobile different than doing work on the computer Rift headsets that we've seen introduced in this
- 17 | case?
- 18 | A. Yeah. We --
- 19 Q. Why?
- 20 A. -- talked about this a bit earlier.
- You know, for example, when we're building a Facebook app, we have to build a different thing, whether we're building an iPhone app versus our website, for example. I mean, they're different experiences to some degree, so they're a different code.

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And similarly, if you're building -- so we've got a mobile version of VR, which is good because you can take it with you anywhere that you go. You basically -- you have your phone. You can snap it in. It doesn't -- you don't have to have a wire to a big computer. There's all these advantages of that, but a phone is generally not as strong of a computer as like the big thing that you might have at your desk.

So Carmack had to do specific optimization for that.

We also have a version which is tied to -- you know, you have a wire from your headset to a really powerful computer that you'd have at your desk and that allows for a higher quality experience because those -- because that computer is bigger and more powerful and you can do more with it. But

16 iPhone app, you know, the mobile version of VR is a pretty

when we at Facebook make our website differently from our

they're basically completely different platforms, and just like

- 18 Q. So the code Mr. Carmack would write for mobile would not 19 be code that would work on the -- on the computer Rift headset?
- 20 A. Most of it, no. And some of it you might be able to 21 adapt, but there would be work.

different thing from the computer version of VR.

- Q. Okay. And that's what you call optimization or is it broader than that?
- A. I was referring to something different, but yeah, it would be a lot of work to take the code from mobile and make it work

1 on a computer.

Q. All right.

Did there come a point in time when you were talking to Oculus that you spoke to Mr. Iribe about potential deal terms?

- A. Yes.
- Q. And do you recall when that was, the first time you discussed -- started discussing that with him?
 - A. Well, we started early because I wanted to get a sense of whether he was even open to selling and at what price, and so I started -- so you want to ask a bunch of questions around what their other options are in the market. So if they were trying to raise more money, because you're trying to manufacture stuff, they were going to need to build all these facilities and do this and get a lot more investment than just what Andreessen had put in.

So I started asking them, "Well, what price do you think you'll raise money at," right? So just to get a sense of is the valuation here reasonable, how would they think about this, and I think that that happened the first time that I went down there. But that was more -- it was less us making an offer and more me just trying to understand how they thought about the market around that.

I also had a number of conversations with other companies and other investors, including Marc Andreessen, about

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the market and other investors in VR and, you know, when they were bid ding to invest, who else was bidding to invest and at what prices, to try to get a sense of what the price that we'd need to offer would be to eventually make a deal work. Do you remember the value that Mr. Iribe first put out for Q. a possible purchase of Oculus? There were a few, but, I mean, I remember 4 billion was Α. what they felt like they were going to -- was -- you know, typically, if you're looking to raise investment for your company, you know, they felt at the time that investors would invest at valuing the company at around \$2 billion, which I checked out with Andreessen and a few other people and ultimately came to the conclusion that that was a reasonable ballpark for where people might invest. You know, I got some early signals, which I think were in some of the texts earlier that suggested that that might be too high. After doing some more checks, I think I came to the conclusion that that was actually a reasonable price. Now, when you're thinking about buying a company, it is typical to -- typically, if you're buying a company, to get control of the company, you end up having to pay a premium over what you would just invest to buy a small piece of the company

but have the other team stay in control. So that premium is --

you know, can be as much as 2x, which I think, is where Brendan

- 1 had gotten to this figure of 4 billion. 2 billion was what
- 2 people would invest in and then to have control of the company,
- 3 | a premium of 4 billion, which I think reflected that they
- 4 | really weren't looking to sell the company. I mean, they just
- 5 | wanted to build this thing and stay independent, so they were
- 6 only going to sell if we made a financial offer that was really
- 7 good.
- 8 Q. All right. Let's take a look at DX1531.
- 9 As we're getting that up and as you can find it, you
- 10 don't recall the exact date when you started talking to
- 11 Mr. Iribe about possible financial terms, do you?
- 12 A. Not a Facebook offer, but I do think that I started asking
- 13 | some questions about the financials around the company that
- 14 | first time that I went down to visit the Oculus headquarters
- 15 and get that demo.
- 16 Q. So that would have been in January of 2014?
- 17 A. I think that's right.
- 18 Q. All right. Okay. Take a look at this email, if you
- 19 could, and start back on the -- where it starts with your email
- 20 on Saturday, February 1, 2014.
- 21 A. I'm sorry. Where are we?
- 22 Q. The second page, the middle of the page where -- is that
- 23 | your email?
- 24 A. Over on the next -- sorry. What document are you on?
- 25 | Q. Document DX1531.

- 1 A. Okay. Okay.
- Q. The second page, is that your email address that you're
- 3 | writing to Mr. Iribe on February 1st, 2014?
- 4 | A. Yes.
- 5 Q. All right. And before we go into this, can you just take
- 6 a look at it, and does this suggest to you whether you had had
- 7 | conversations with Mr. Iribe about potential financial terms
- 8 before Saturday, February 1 or after? Or the valuation?
- 9 A. Yeah, we had a few conversations, like I said. I mean,
- 10 this suggests that, potentially, Brendan's price for -- at
- 11 which he would do the deal increased, which I do remember, I
- 12 | think, happened at some point. I don't remember what -- at the
- 13 beginning of the negotiation where he was, but I do remember
- 14 towards the end they were trying to get to 4 billion.
- 15 Q. All right. And in this -- we're not going to go through
- 16 the whole email, but if we could go to the next page at the
- 17 very bottom, the last paragraph that says "strategically."
- 18 Let me read this to you.
- 19 You say to him, "Strategically, it seems like you
- 20 have a three-year head start on the rest of the industry, and
- 21 this is your opportunity to cement Oculus as the standard VR
- 22 system people will use for decades."
- 23 What did you mean by that at the time? And then we
- 24 can talk about whether you still agree with it.
- 25 A. So they were ahead in technology. They built this headset

that was better than what others had, and we had looked at the other headsets that were on the market and were coming on the market at the time, including one from Sony that they -- it wasn't a consumer product yet, but they had a developer kit like Oculus. And the Oculus one, we thought, was clearly better.

So we thought that they had a good head start, but you know, when -- I think what can frequently happen is that a lead -- if you have a hardware advantage, other companies can catch up to that, right? So if you look at phones, for example, you know, when the iPhone first came out, there was nothing else like it. And now, you know, I think a lot of people would argue that there are other phones that have just as many features and are just as good as the iPhone in different ways.

So for a lot of people the reason why they like either the iPhone or Samsung phones at this point, or whatever it is that they use, is not just because the phone is better, but because there is a whole developer community and different apps around those different devices.

So that's, I think, what we needed to do, was just take -- you know, just like how Apple originally, I think, had a key, had a big advantage where the iPhone was clearly better than everything before it, Apple then went and built the app store in the community that I think solidified a lead that they

- 1 had. And that's what I think the Oculus team had to go do, was
- 2 turn the hardware advantage that they had at the beginning into
- 3 a sustainable app ecosystem.
- 4 Q. I understood what you said. But after that, explaining
- 5 this, "Within three to five years, some of the technical
- 6 challenge you've solved will become easier to solve because
- 7 hardware will improve."
- 8 Is that what you were just saying to us -- explaining
- 9 to us?
- 10 A. Yes.
- 11 | Q. "So others will be able to replicate them. If you have
- 12 any success, then other companies will definitely enter the
- 13 space.
- 14 "If you haven't solidified your ecosystem with the
- 15 most important killer apps yet, then you will likely be
- 16 | fighting a war against Microsoft, Google, or someone else where
- 17 you are outresourced."
- 18 Is that consistent with the explanation that you just
- 19 gave the jury?
- 20 A. Yes.
- 21 | Q. Now, when you say "killer apps," what do you mean by that?
- 22 A. It's an industry term.
- So the basic idea is that for every computing
- 24 platform, like the iPhone, for example, or a computer with
- 25 Windows on it, you know, people don't want to have an iPhone to

have an iPhone. They want to have it because there's a few things that they do on it that are critical to them.

So for phones, text messaging was a really important one or being able to use a web browser or to look things up or an app store at this point to get access to a lot of different apps.

So the question is, you know, what are the -- what are the killer apps for VR going to be? What are going to be the things that people buy a VR system in order to get access to those?

And the most important platforms and businesses that I think have gotten built over the last few decades are ones where those come together, where one company builds both the platform and the killer app, and I think our argument was social communication, and a lot what Facebook does is, I think, one of the killer apps of all computing. Right?

It is certainly one of the big things that people do on phones, and I think it is going to be one of the big things that people do in VR too.

So we were on track to building that. They were on track to try to build this platform but had no killer apps. If we came together, then -- just like Microsoft had done with Office during the '90s where they both -- they were both -- there was Windows in the computer and there was Microsoft Office, the productivity suite that people really wanted to

- 1 use, and, you know, different communication products on phones,
- 2 | we felt like we could build that experience for VR, and that
- 3 | would be the most valuable thing that we could do together.
- 4 Q. After explaining this to Mr. Iribe, did you offer to
- 5 | continue your discussions with him?
- 6 Look down to the bottom.
- MS. WILKINSON: If we could go down to the last paragraph, please, Dave.
- 9 Take a look at "if you're still open."
- 10 A. Yes.
- 11 Q. Did Mr. Iribe, in fact, take you up on your offer?
- 12 A. I think later.
- 13 Q. All right. Did there come -- was there some other deal or
- 14 | something else going on during this time while you were
- 15 beginning your discussions with Oculus that took you away from
- 16 the negotiating table?
- 17 A. Well, we were building a lot of things at the time, but we
- 18 also -- between this, which I think was in late January, early
- 19 | February and, I think, mid-to-late March when we actually
- 20 agreed to the Oculus transaction, we did also buy this company
- 21 WhatsApp, which was a much larger transaction than this. It
- 22 was \$19 billion.
- 23 | Q. 19 billion?
- 24 A. Yeah. It was a big -- it's expensive. I mean, there are
- 25 more than a billion people around the world who use WhatsApp

now. Almost a billion people use it every day.

So it is a big thing, and it fits right with Facebook's core ethos. It is a communication product for texting and communicating with groups and, similarly, I mean, I knew that they would just be much better and be able to build better services as part of Facebook, and their founder agreed.

But we had a whole kind of parallel process to this where I was talking to -- to their founder about that. And as you can imagine, this takes a bunch of focus to do -- so -- you know, doing multiple multibillion dollar deals at the same time is hard.

- Q. Did this WhatsApp deal move at a pretty rapid clip like your negotiations with Oculus?
- A. Yes. But I want to add some -- I want to make sure that the testimony on this is complete. So I think that this is being characterized as if we suddenly just decided one day, we woke up and decided we were going to do this and then looked at some documents over a few days and then did the deal.

In reality what is happening in all of these, in Instagram and WhatsApp and Oculus, they are kind of things that we've been thinking about for a long time -- right? -- and I've been building relationships, at least in Instagram and the WhatsApp cases, for years with the founders and the people that are involved in these companies, which made it so that when it became time or when we thought it was the right time to move,

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we felt like we had good amount of context and had good
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 2
     relationships so we could then move quickly, which was
     competitively important and why we've been able to -- why a lot
 3
    of these acquisitions, I think, came to us instead of our
 4
 5
     competitors and ended up being very good acquisitions over time
 6
     that a lot of competitors wished that they had gotten instead.
 7
              So I want to make sure we're clear on this.
                                                            It's not
8
    like I just woke up one day and decided that we were going to
9
     do this and then a week later we did it. I mean, that's not
10
     how billion dollar projects come together. I mean, these were
     all things that I think we've been thinking about for a while.
11
12
     But when it came time to actually pull the trigger and say,
13
    okay, we've been talking about and thinking about this for a
    while, but now let's move forward and try to do this, we put
14
15
     all the pieces in place so we could move pretty quickly.
         All right. Do you -- I asked you about a dinner in --
16
    Q.
17
    with Mr. Iribe sometime in late January.
18
              Take a look at DX1532 and just see if this refreshes
19
    your recollection about when that dinner occurred.
20
              MS. WILKINSON: Can you take it down until -- thanks.
     Just so he can look at it. Thanks, Dave.
21
22
              THE COURT: It isn't already in evidence?
23
              MS. WILKINSON:
                              1532 -- 1532, no.
              THE COURT: It's not on the list either?
24
25
                              No. It's -- well, I don't know
              MS. WILKINSON:
```

```
1
    what --
               (Pause)
 2
               THE COURT: Wait a minute. Let me see if it's on the
 3
    list.
 4
 5
              1342?
 6
              MS. WILKINSON: 1532, Your Honor.
 7
              THE COURT: Oh, excuse me.
 8
               (Pause)
 9
              MS. WILKINSON: No objection?
              MR. SAMMI: No objection.
10
11
              MS. WILKINSON: He doesn't object, Your Honor.
              THE COURT: It's not on the list. You're right.
12
              You're offering it into evidence?
13
              MS. WILKINSON: Yes, and Mr. Sammi doesn't object.
14
              THE COURT: That document is admitted into evidence.
15
               (Defendants' Exhibit No. 1532 received)
16
17
     BY MS. WILKINSON:
          Now we can do it. Now we're going to start in the middle
18
    0.
19
    just to make it confusing because --
20
              Is this the email --
21
              MS. WILKINSON: Go to the middle, please.
               -- from Mr. Iribe --
22
23
               No. Yeah, right there. There we go.
               -- to you forwarding something from Mr. Carmack?
24
25
          Yes, it looks like it.
    Α.
```

- 1 | Q. what's the date of the email?
- 2 | A. January 31.
- 3 Q. And what does he say in the first sentence?
- 4 A. "Thanks for an amazing dinner."
- 5 | Q. And the next one? Sorry.
- 6 A. "Really enjoyed the discussion and the endless duck."
- 7 | Q. What is "endless duck"?
- 8 A. I don't know. That must have been what we ate that night.
- 9 Q. All right. So does that refresh your recollection that
- 10 you had a dinner around the end of January with Mr. Iribe?
- 11 A. Sure.
- 12 | Q. And he forwarded you this email from Mr. Carmack, right?
- 13 | A. Yes.
- 14 MS. WILKINSON: If you could show that just for a
- 15 minute, please.
- 16 BY MS. WILKINSON:
- 17 Q. And then let's go back up, if we could, to your response.
- And who are you writing to on Sunday, February 1st,
- 19 | 2014?
- 20 A. It looks like Brendan and cc'ing Amin and Nate, who is
- 21 Brendan's co-founder at Oculus.
- 22 Q. Okay. And what do you tell him?
- 23 A. Do you want me to read this?
- 24 Q. You can or you can just describe your purpose of this.
- 25 | I'm going to ask you to explain the second paragraph, but --

A. Sure.

Well, we're summarizing what we talked about at dinner, which is basically the vision of why it made sense for Oculus and Facebook to work together on building this future platform instead of us trying to build it from scratch or them continuing as a separate company.

Q. And I think you've explained a bit of this to us just a few minutes ago, but the second sentence or second paragraph, when you say, "The OS Plus killer app strategy has much more potential than what either of us can do on your own."

What did you mean by that?

A. Sure. This is what we were talking about a few minutes ago, that if you look at the major computing platforms over the last few decades, right? So computers with, you know, Windows on them and Microsoft Office, they were very important for productivity in -- in the work space, mobile phones with different communication apps and the ability to access the internet on them.

What you want in defining a new category for computing is to both be able to build the platform, which in this case is the headset and all the experience around that, and then also have not just a big ecosystem of content, but you need to have, like, the key things that half of the people are going to want to use, right?

And if you don't have that key thing, then, you know,

people aren't going to want to go buy a headset if there is not a key thing that they want to go use with that.

In order for VR to really work, we need both the OS, operating system or the platform that I'm referring to, and the killer app, which is the key experience that a lot of people really want.

Q. All right. Just one other thing in there. In the next paragraph you talk about accelerating growth, and you say, "We can add more great engineers to your team and lower your prices. If you can get to 10 million units a couple of years sooner, we can get every developer and studio in the world building just for Oculus before any big competitor even exists."

Why is the lowering the price important in terms of building up the developer community and getting ahead of the competition?

A. Well, people are more likely to buy something if it's more affordable, right? So if the device is, you know, \$400.00 instead of \$1,000.00, that is going to make it affordable for more people and the more people that can afford it are going to decide it is a good deal and want to buy it.

The reason why Facebook can help Oculus do this is that we already have a big business from Facebook, so we don't need to make money on this for a long time. So, whereas, if Oculus were a separate company and they can build this for

- 1 \$400.00, they would need to sell it for 500.00 or \$600.00 in
- 2 order to make a profit to pay for all their people and sustain
- 3 the company, whereas, at Facebook, we don't have to do that.
- 4 Right?
- I mean, we can make enough money from our -- from
- 6 | Facebook that we can just fund this for ten years or a long
- 7 period of time, however long it would take to develop this new
- 8 thing, and make it more affordable for people in the world to
- 9 get access to virtual reality.
- 10 So that's just a thing that on day one, you know,
- 11 | them joining us makes this better for people who would consider
- 12 buying virtual reality.
- 13 Q. All right. Let's move on to March, if we could, of 2014.
- 14 I believe counsel asked you about Mr. Andreessen and
- 15 his investment that he made between November and January into
- 16 Oculus.
- Because he was on your board, were you trying to
- 18 overpay for Oculus to help out Mr. Andreessen?
- 19 A. No.
- 20 | Q. Okay. Did you have different concerns about
- 21 Mr. Andreessen and whether he would be happy about Facebook
- 22 | buying Oculus?
- 23 A. Yes. I was worried that he was going to try to convince
- 24 | the Oculus team not to sell.
- 25 Q. Okay. That's a little hard for us to understand. So

- 1 explain. He's invested -- how much did you tell us? --
- 2 | 73 million?
- 3 A. Yes. This is counterintuitive.
- 4 Q. So he puts money into this company.
- 5 A. Yeah.
- 6 | Q. You're about to offer them \$2 billion, and you're afraid
- 7 | that Mr. Andreessen is going to be mad?
- 8 MR. SAMMI: Objection, leading the witness.
- 9 THE COURT: I'm going to let her do it on that little
- 10 part because it is complicated.
- 11 MR. SAMMI: Thanks, Judge.
- 12 THE COURT: I should sustain you, but I'm going to
- 13 overrule you.
- 14 MR. SAMMI: Thank you. I will take that.
- THE COURT: You should have won, but you didn't.
- 16 BY MS. WILKINSON:
- 17 Q. So we just want you to explain. We don't understand that,
- 18 so explain that to us.
- 19 A. Sure. The venture capital business model -- you know, I
- 20 think most people, you would be happy if you invest a dollar
- 21 and you make \$2.00 back. I mean, that's good. And, you know,
- 22 he's not -- he wasn't sad about the outcome.
- But what venture capitalists are really focused on
- 24 is, they invest in 20 companies, and the expectation is that,
- 25 | you know, maybe 15 of them won't go anywhere, and they might

lose money on those, and they might go bankrupt.

And what they try to do is have one really good company, right? So one, you know, Google or Apple or, you know, whatever -- whatever you think of as a great technology company, and if you can do that, then that more than makes up for all the other ones that fail.

So when I talked to Andreessen earlier, he told me that he was more optimistic about Oculus being Andreessen Horowitz's breakout investment than any of the other 20 that they had done.

That didn't necessarily mean that it was necessarily going to work, but it meant that of the ones that he thought had a chance of being the next huge company that this had a good shot, which -- you know, that was before we were really -- that was pretty early on and all this, and that just made me think that, rather than being happy that we were going to buy them and that he would make some money in the short term, what was actually more likely was he would be kind of be a little bit disappointed that it didn't get to play out and see if it could become a massive, massive company on the scale of the biggest technology companies in the world.

And from his perspective, he is more than willing to take that risk, and he would almost rather take that risk and hope it becomes huge and have it blow up along the way and end up not being anything than selling before that.

- 1 Q. Why? What happens if it does become the biggest
- 2 technology company in the long term?
 - A. Then that's how they do the best at their firm.
- 4 Q. They make more money that way?
- 5 A. Yeah. And it's -- and their reputation and the change
- 6 that they feel like they contributed to in the world is bigger.
- 7 Q. Did you raise these concerns with your team at Facebook?
- 8 A. Yeah, I think so.

- 9 Q. All right. Take a look at what's Plaintiffs' Exhibit 146,
- 10 but you have it in your book as Defense Exhibit 1440, and it is
- 11 going to be at 25892.
- 12 MS. WILKINSON: Your Honor, this is a long exhibit.
- 13 Mr. Sammi and I agreed we're only putting in the ones that were
- 14 | actually -- we're only agreeing to the ones we've discussed.
- THE COURT: This one is real little bitty that we
- 16 | couldn't read.
- 17 MR. SAMMI: Yes.
- 18 THE COURT: Unless you blow it up.
- 19 MS. WILKINSON: Yes.
- 20 THE COURT: He highlighted them in yellow? Is that
- 21 | the same document?
- MR. SAMMI: Yes.
- MS. WILKINSON: Yeah, so there's the message. And
- 24 then, if we could, just put it on slide Number 9, David,
- because then the jury -- well, there we go. That's fine.

```
1
     BY MS. WILKINSON:
         Okay. Mr. Zuckerberg --
 2
    Q.
              THE COURT: You've got the number so you can find it?
 3
              MR. SAMMI: Yes, Your Honor.
 4
 5
              THE COURT:
                          Thank you.
 6
              MR. SAMMI: Thank you.
 7
     BY MS. WILKINSON:
 8
          That's the number over there on the left -- right? --
    Q.
 9
    Mr. Zuckerberg, of your text, 25892?
10
               Do you see that on the screen, the number on the
11
    left?
12
    Α.
          Yes.
13
         And then that says, "Mark Zuckerberg at WhatsApp."
    Q.
               Is that the company you were just telling us that you
14
15
    purchased?
16
    Α.
          Yes.
          All right. And tell us what -- this is -- I don't think
17
    it shows there, but this was to Mr. Zoufonoun. Read to us what
18
19
    you told him, please.
20
          "I think we just need to keep them excited. Otherwise, I
    Α.
21
    worry that even if we meet their price demand, they may decide
22
    not to do it or Andreessen might convince them not to at the
23
     last minute, and that would set up a terrible dynamic where
24
    we've caved on price once, and they'll think we'll do it again
    in the future."
25
```

- 1 Q. Who are you talking about? Who's the "they"?
- 2 A. The Oculus team.
- 3 Q. And "keep them excited," what do you mean by that?
- 4 A. It's -- this gets -- again, I don't remember this exactly,
- 5 but I think it's referring to this dynamic around talking about
- 6 the shared vision for what we would build together, right?
- 7 | Because without -- those were the pillars that we agreed to
- 8 when we decided to come together as companies, was this shared
- 9 perspective on what we wanted to build in the world and what
- 10 everyone perceived was a fair -- a fair, quite expensive, price
- 11 | for the company.
- 12 | Q. All right. Were you also concerned about whether other
- 13 companies might come in and try and purchase Oculus out from
- 14 underneath you?
- 15 A. Yes.
- 16 | Q. Did you share those concerns with your team?
- 17 | A. Yes.
- 18 MS. WILKINSON: All right. Let's go to the same
- 19 exhibit but to 2600. And if you could blow up that up for us,
- 20 Dave, I would appreciate it.
- 21 (Pause)
- 22 BY MS. WILKINSON:
- 23 | Q. All right. What are you reporting up there in the first
- 24 message?
- 25 A. Do you want me to read it?

- 1 Q. Yes, please.
- 2 A. "He said someone from Google recently expressed interest."
- 3 Q. And what did you say next?
- 4 A. "He prefers to work with us, but his board might make him
- 5 check with Google and Microsoft first."
- 6 Q. Who is he?
- 7 A. I assume it's talking about Brendan.
- 8 Q. All right. And what did this tell you about whether you
- 9 needed -- or what did this tell you about the status of your
- 10 | deal and what you wanted to do?
- 11 A. Well, Google is a big competitor for us when we're
- 12 thinking about doing these kinds of deals, so, for example, --
- 13 and there are other companies as well -- right? -- Microsoft
- 14 and others. You know, we've talked a little bit about
- 15 WhatsApp, which was another deal that we did around this time
- 16 horizon.
- 17 And just to give you a flavor for this, you know,
- 18 | that kind of happened on a similar timeframe. I had been
- 19 talking to Jan, the founder of WhatsApp for, in their case,
- 20 | years -- right? -- in terms of getting to know each other, and
- 21 then we decided we wanted to do it and actually worked out the
- 22 deal terms over a couple-week period, I think.
- 23 And during that period, even though that deal was
- 24 | much bigger, \$19 billion, during the two weeks that we were
- 25 | negotiating, another company actually came in and said that

they were willing to offer more money to buy that company. And the reason in that case why I think he -- he -- he went with us is because, again, this belief in the shared vision of what we could do together and the relationship that we'd built over a few years of getting to know each other and what the companies and our values were all about.

so -- but it's the kind of thing -- it's really -- there's a lot of anxiety in these deals, right? I mean, this is something -- you know, if you're going to pay \$19 billion for a company or \$2 billion for a company, you clearly have to really believe in it. I mean, those are very large amounts of money.

And the idea that one of your competitors might -that there's this thing that you think is awesome that would -that you want to be a part of building and that you think would
really help our business and our community, but that then a
competitor might get that, I mean, and that's doubly bad.
Then, not only do we not have it, but a competitor who would be
using it to compete against us has it.

So there's this general push where you want to -- you want to move as quickly as is reasonable to move, and that doesn't -- I mean, of course, we're not going to want to make a deal if we don't have all the knowledge that we think we need to have, but we also don't want to dilly-dally, right? And if we -- you know, I think some companies might just take many

- 1 weeks or months to review some of the stuff, and I think one of
- 2 the things we've always prided ourselves on and one of the
- 3 things that has always worked well about Facebook is that we've
- 4 just been able to be flexible and move quickly on important
- 5 things. And that's served us very well.
- 6 Q. Did there come a time when you decided to go forward with
- 7 | the deal or were close and briefed your board about the terms
- 8 of the deal?
- 9 A. I think multiple times.
- 10 | Q. Okay. And did you tell them what you thought the cost of
- 11 | the deal would be?
- 12 A. Yes, of course.
- 13 | Q. All right. I believe you've already told Mr. Sammi
- 14 | \$2 billion to purchase the company itself; is that right?
- 15 A. Yes.
- 16 Q. And then you said \$700 million for paying the people.
- Can you just explain to the jury what you mean by
- 18 | that?
- 19 A. Sure. So you can think about -- there's the company
- 20 | itself, which has the technology that they've built and all the
- 21 assets of the company, and then there are the key people who
- 22 are doing the work. And in our assessment here, a huge amount
- 23 of what -- of what the value of Oculus was going to be wasn't
- 24 | in what they already built but what they were going to do going
- 25 forward.

So we wanted to make sure that out of what we were 1 2 paying as much as possible went towards the people who were actually going to be going and building stuff over the next 3 five or ten years -- right? -- not -- you know, not some people 4 who might have built something, you know, at the beginning of 5 the company or, you know, folks like Andreessen who invested 6 7 and helped them but weren't actually going to be involved in building the company going forward because the belief is that, 8 9 you know, most of the value and most of what needed to get done 10 was still ahead. 11 So we structured this deal similar to how we structure a lot of other ones where a large percent of what we 12 13 were paying didn't actually go to the company itself but went 14

to the key people over a long period of time to incentivize them to keep working on this over a long period of time to keep on building out what we knew needed to get built.

So the day you close on the deal, did you write a Q. \$2.7 billion check or a \$2 billion and \$700,000.00 check?

THE COURT: \$700 million.

15

16

17

18

19

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MS. WILKINSON: 780. Thank you.

THE WITNESS: No. All the key folks who were involved have -- their consideration is what we call vesting, They will earn it over a five-year period, and then we also had some part of the deal that was tied to achieving specific milestones. So once they sold a certain number of

```
1
     headsets and, you know, reached a certain amount of activity of
 2
    people using them, then they unlocked part of the deal with
     Facebook as well.
 3
              I'm sorry. Is that me?
 4
 5
              MS. WILKINSON: You may be moving around just a
    little bit.
 6
 7
              THE COURT: Is it touching your cheek?
              THE WITNESS: Maybe. I'll -- I'll bend it.
 8
9
     BY MS. WILKINSON:
10
         Did you also -- sorry.
    Q.
11
               Did you also talk to the board about a future
12
     investment you would have to make in Oculus if you decided to
13
    go through with the deal?
14
    Α.
         Yes.
15
         What did you tell them?
    Q.
16
    Α.
         So we told them that we expected that on top of what we
17
    would be committing to pay up front, we should also expect to
18
    have to invest at least $3 billion more in building up the team
19
     further, investing in the developer community, and all of the
20
    other content that was around that, which is not a dissimilar
21
     amount to what I think, you know, Microsoft paid when they were
22
     building -- or invested when they were building xbox, for
23
     example, when you build the initial platform, and then you
24
     continue paying to employ a lot of people to continue working
25
    on the platform and to build out the developer community around
```

1 that.

2

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So it's a lot of money, but there are comps -comparables that other companies have built when they're
building other computing platforms that suggest that that would
be a reasonable amount, so we discussed that with the board.

- Q. Did your prediction come true, that you had to invest billions of dollars in the company in addition to what --
- 8 A. Yes.
- 9 | Q. -- you paid?
- A. Yes. But I think, as with a lot of things, these things end up being more complex than you think upfront. If anything, we probably have to invest even more money to realize the goal that we had than we had originally thought.

So, you know, if we bought the company for \$2 billion and had these, you know, packages that we -- that we offered to key employees that the sum came out close to \$3 billion upfront and we were planning on investing another \$3 billion, now I think we'll actually have to invest somewhat more than \$3 billion over the next ten years in order to reach this goal of, you know, hundreds of millions of people having a good VR experience.

- Q. In addition to getting the technology, I think you mentioned you were excited about the people that you were getting when you purchased the company, right?
- 25 A. Yeah. I mean, that's a key part of it.

Since most of the work was ahead, it wasn't something that we could just buy and have it be done, right? I mean, most of the work actually hadn't happened yet. Having the best team was actually probably the most important part of the deal.

And, you know, again, because Facebook is a social networking company, we didn't have a lot of people before who worked on VR, so we needed to build up that base of talent who could build that from scratch. And that could take a long time, and, again, you know, moving quickly, you know, those few years of head start and advantage was pretty important, so having this team, which is clearly the best team in the field, working on this as the seed just gave us a big advantage there.

And then, you know, of course, it's one of these examples where really great people attract more great people who want to work with them, so, you know, I think the day or the week after we announced that we were going to do this, another really key person in the field of VR decided to join them because it was like oh, wow, now Facebook and Oculus are coming together. This is going to be clearly the best place to go work on VR, so I want to join you.

So that's a lot of what we were trying to do, just build the dream team of people to work on virtual reality, knowing that it was going to be a five- to ten-year investment and that those people, after the acquisition, were going to be the people actually building out virtual reality.

- 1 Q. So we heard you say that you, of course, met with
- 2 Mr. Carmack over the few months you negotiated.
- 3 And you met with Mr. Luckey?
- 4 A. Yes.
- 5 Q. And you met with Mr. Iribe?
- 6 A. Yes.
- 7 | Q. Did you also meet with Mr. Patel, Nirav Patel?
- 8 A. Yes.
- 9 Q. And the man you just mentioned, did you -- were you
- 10 talking about Michael Abrash?
- 11 A. Yes.
- 12 Q. And were there other technical -- it was suggested there
- 13 was only one technical person you were interested in; is that
- 14 | correct?
- 15 A. I'm sorry. You asked me --
- 16 Q. You suggested --
- 17 A. I talked about Abrash. I didn't talk to Abrash --
- 18 Q. Right.
- 19 A. -- until after --
- 20 Q. Was that the person you were mentioning?
- 21 A. That was the person that I was mentioning.
- 22 Q. But it was suggested by counsel that somehow you were only
- 23 really interested in getting Mr. Carmack; is that true? He was
- 24 | the only key person?
- 25 A. Is it true that he was the key person or --

- 1 Q. The only key person.
- 2 A. I certainly think they were trying to suggest that. I
- 3 don't think that's true.
- 4 Q. Okay. All right. Thank you.
- 5 Do you know someone named Mr. Atman?
- 6 A. Yes.
- 7 | Q. And did he -- was he part of the Oculus team?
- 8 A. Yes. He's the chief architect of the computer kind of
- 9 desktop product that we talked about a few minutes ago.
- 10 | Q. And what about Mr. Romaine, a Google guy?
- 11 A. Yeah. I don't know that he ever joined.
- 12 Q. Okay. Did you and others talk about who the key
- 13 technology people were, the key team at Oculus was?
- 14 | A. Yes.
- 15 Q. All right. And when you talked to the board and you told
- 16 | them about the deal, did it include describing who the team was
- 17 and why assembling a team, as you call it the dream team, was
- 18 an important part of this deal?
- 19 A. I don't remember specifically, but I'm sure we did,
- 20 because, I mean, that's such an important part of this, in any
- 21 deal. Not just in this case, but, I mean, you're -- you invest
- 22 in people.
- 23 Q. In addition, did you talk to the board about due
- 24 diligence, what you were doing and what you were going to have
- 25 people continue to do to make sure that this was a good deal

- 1 for you?
- 2 A. Yes, a lot.
- 3 | Q. Okay.
- 4 A. And -- you know, this is another thing where I think it's
- 5 | important to give -- to complete the testimony, because I think
- 6 | there was a timeline that we showed earlier for legal
- 7 | diligence. And what we -- what that means is just going
- 8 through the, you know, technical and legal documents of the
- 9 company to understand everything that's there.
- 10 I think the most important diligence or things to
- 11 understand when you're looking at a company are, are the
- 12 products good -- right? -- is the technology good, what are
- 13 competitors doing, are they -- is this company ahead of
- 14 competitors, are the people good, are they talented, are they
- good people, are they the kind of people that you want to work
- 16 with, right. So you will be working with them for years, so,
- 17 you know, they better be people that you like working with and
- 18 that you feel like share your values.
- 19 That, I think, is the most important diligence. And
- 20 in this case, you know, it was done over months. In some of
- 21 the cases of the other deals that we've done over years, even
- 22 though the actual deal itself came together pretty quickly at
- 23 the end, technically.
- 24 Q. All right. Let's take a look at -- first of all, do you
- 25 or people who work for you put together board materials, you

- 1 know, so you can show the board members a summary of what
- 2 | you're telling them about deals --
- 3 A. Yes.
- 4 | Q. -- and other matters you bring before the board?
- 5 A. Yes.
- 6 Q. All right. Let's take a look at DX544 at 352, please.
- 7 All right. Is this part of a board presentation on
- 8 the Oculus deal?
- 9 A. I think so. Sorry. What was the number?
- 10 | Q. It is --
- 11 A. 425?
- 12 Q. 544.
- 13 A. 544, okay. Got it.
- 14 | Q. At 352.
- 15 | A. Yeah.
- 16 | Q. And do you see there on the front there it says, "Project
- 17 Inception"? This is not the front page.
- 18 MS. WILKINSON: Dave, you were going to show that,
- 19 and I should have had you keep it up there.
- 20 BY MS. WILKINSON:
- 21 | Q. Let's look at the first page just to identify.
- 22 What does this say?
- 23 A. This says, "Project Inception, directors only; privileged
- 24 and confidential."
- 25 O. And what's the date?

- 1 | A. March 23.
- 2 Q. So was this the presentation that you gave to the board
- 3 about the Oculus deal that you said was named Project
- 4 Inception?
- 5 A. I would have to read it, but I have no reason to believe
- 6 it's not.
- 7 | Q. Okay. Let's take a look then. Now go to 352, if you
- 8 could.
- 9 And this says, "Due diligence review key area of
- 10 focus: Samsung relationship."
- 11 | Would that be something you would want to explore in
- 12 | considering the Oculus deal?
- 13 A. Yes.
- 14 | Q. Why -- briefly -- briefly, why would the Samsung
- relationship be important in this particular deal?
- 16 A. Because Samsung was the key technology partner. They
- 17 built the screens, and they built a special kind of screen that
- 18 could make it so that you could -- you know, we were talking
- 19 before about how you turn your head and it needs to render
- 20 quickly. That at the time was only possible on Samsung
- 21 | screens, and we were working with them.
- 22 | Q. All right.
- 23 A. So they were an important technology product for us on two
- 24 | fronts, and it was important to us that -- that that was a good
- 25 relationship.

- 1 Q. There's a list here. Were you doing all this work
- 2 yourself or do you have folks at Facebook who do this
- 3 diligence?
- 4 A. We have teams of folks who are dedicated to this, so, I
- 5 mean, for the important questions, people will raise the
- 6 | material to me or sometimes I will even be the person asking
- 7 | the question and asking the team to look into it, but, in
- 8 general, you know, we have a lot of projects going on at a
- 9 time, and we have a dedicated, you know, legal group and deal
- 10 group for each effort that we're working on.
- 11 | Q. So did you ask people to look into not only the Samsung
- 12 relationship but intellectual property, license, and open
- 13 | sources -- open source?
- 14 A. I don't think I needed to. Those are automatic things
- 15 that you would look into.
- 16 Q. The supply chain?
- 17 A. Yes.
- 18 Q. Litigation?
- 19 A. Yeah. These are just kind of standard things.
- 20 Q. And all the rest of those.
- 21 So this work would have been done before you closed
- 22 | the deal with Oculus?
- 23 A. Yes.
- 24 | Q. All right. Now, after you announced the deal -- and I
- 25 | believe Mr. Sammi said -- and you didn't disagree -- was

- 1 March 25th -- right? -- did you continue to look at some of the
- 2 issues and talk to some other folks about your concerns and
- 3 your, you know, your expectations about Oculus?
- 4 A. Sorry, can you say that again?
- 5 Q. Yeah. Did you discuss with people -- after you announced
- 6 | the deal, did you just let it go once you announced it, but
- 7 | were you still involved once you announced the deal before it
- 8 closed?
- 9 A. No. I mean, I'm -- not only then, but I'm still very
- 10 | involved in it.
- 11 | Q. All right. And we've heard during this trial suggestion
- 12 that Oculus had some special software as well as hardware.
- Did you consider Oculus a hardware company or a
- 14 | software company?
- 15 A. It was mostly a hardware company.
- 16 | Q. All right. Let's take a look at DX1928, please.
- 17 And this is an email chain from the end of April into
- 18 | May.
- 19 Let's go down to --
- 20 A. I'm sorry, where was this?
- 21 Q. DX1928.
- 22 A. I don't have it.
- 23 Q. Okay. Then I will give you a copy. Sorry about that.
- 24 (Pause)
- 25 A. Thank you.

- 1 Q. Sure.
- 2 So look down at the bottom where the email starts
- 3 from you, if we could.
- 4 And are you writing to a whole bunch of folks at
- 5 | Facebook on Tuesday, April 29th.
- 6 A. Yes.
- 7 | Q. All right. What's the subject of the email?
- 8 A. Oculus.
- 9 Q. Now, go down, if you could, and read the second paragraph,
- 10 at least the first -- one, two -- three sentences, if you
- 11 could.
- 12 A. Sorry. Do you want me to read the first three sentences?
- 13 Q. Please.
- 14 A. "One important strategy point that we will really need to
- 15 work through with them is shifting them to become a software
- 16 business. As an independent company, their goal was to sell
- 17 their devices at a premium and run everyone's software. But
- 18 with us, our goal is to own the key software and use their
- 19 | hardware as a vehicle to deploy it."
- 20 Q. All right. And why was this a concern of yours at the
- 21 time?
- 22 A. Well, it goes back to this point around building the
- 23 platform and the most important apps on top of it. You know,
- 24 so far, they had built the headsets and the systems to run
- 25 that, but what I think is going to end up being important over

```
time are what are the social experiences, the different gaming
1
     and other experiences that you can actually deliver?
 2
               People aren't buying this to have a headset. They
 3
     are buying it to have those experiences, and that's the thing
 4
 5
    that we need to deliver, and we needed to shift Oculus's
     culture to some degree and the strategy and the focus towards
 6
 7
    that.
         All right. Let's take a look at PX425.
 8
    Q.
 9
              Tell me if you have that in your notebook, please.
10
               (Pause)
         I do.
11
    Α.
12
         All right. Let's go down to your -- this is -- there is a
13
     response from Mr. Andreessen, but let's go down to your email
    that starts on Tuesday, May 27, 2014.
14
15
              Do you see that?
16
    Α.
         Yes.
         And can you review the email. Is this also about Oculus?
17
    Does it say "Re Oculus integration"?
18
19
    Α.
         Yes.
20
         All right. And you tell Mr. Andreessen that you --
    Q.
21
    there's a bunch of management issues that have come up, and
22
     then you say, "The biggest other set of questions is around how
     they build platform network effects."
23
              Right? That first sentence.
24
25
              MS. WILKINSON: Can you highlight that, Dave.
```

- 1 A. Yes, I see it.
- 2 Q. All right. Can you read the next sentence, please.
- 3 A. "I'm currently worried that they're just hardware, and
- 4 someone could replicate their work relatively easily in a
- 5 | couple of years."
- 6 | Q. And the next one, please?
- 7 A. "We need to move from a hardware tech advantage to a
- 8 | software platform network effect advantage."
- 9 Q. Is this consistent with the other emails and the
- 10 explanation that you gave about them being concerned that they
- 11 were a hardware company and not an experienced software
- 12 | company?
- 13 A. Yes.
- 14 Q. All right. Let's wrap up the timeline, if we could, and
- 15 go to slide Number 19.
- 16 You announced the deal on March 25th. Did Oculus
- 17 have to make any disclosures to you to show you what
- 18 information you might want to know about the company before you
- 19 | closed the deal?
- 20 | A. I'm sure.
- 21 | Q. Okay. And you said, I think, already that --
- MS. WILKINSON: Sorry, I may have the wrong number,
- 23 but it's this one. Sorry about that.
- 24 BY MS. WILKINSON:
- 25 Q. You had to reply to government agencies to determine if

- 1 | they had any objections; is that right?
- 2 A. Yes.
- 3 Q. And so would that include the Department of Justice?
- 4 A. Yes.
- 5 Q. Okay. And these other agencies listed here, the FCC?
- 6 A. I guess so.
- 7 | Q. All right. And did the deal close on July 21st, 2014?
- 8 A. I don't know the exact date, but that sounds about right.
- 9 Q. All right. Now, going forward, once you purchased Oculus,
- 10 was the company or has the company been divided up into
- 11 | different divisions?
- 12 A. There are different product teams. I don't think we call
- 13 them divisions.
- 14 Q. What are those product teams? What are they
- 15 responsible --
- 16 A. There is a mobile group. There is desktop or computing
- 17 group for -- sorry. Desktop computer -- the Rift product.
- 18 Those are the two approaches we talked about, and then there
- 19 are other teams working on the software experiences.
- 20 | Q. All right.
- 21 A. And platform.
- 22 Q. So when you refer to the Rift, that's the desktop Rift,
- 23 | right? That's -- you need a desktop computer --
- 24 | A. Yes.
- 25 Q. -- to experience the Rift?

- 1 A. Yes.
- 2 Q. Mobile is a different product?
- 3 A. Yes.
- 4 Q. All right. And are you familiar with -- since you said
- 5 you've been involved -- the innovations Oculus has done since
- 6 you purchased them in 2014?
- 7 A. Some of them.
- 8 Q. Okay. Let's take a look at demonstrative Number 21.
- 9 MS. WILKINSON: Next one. Sorry. 22. There you go.
- 10 BY MS. WILKINSON:
- 11 | Q. Up here we have DK1. You said they had this developer
- 12 | model out before you purchased them, right?
- 13 | A. Yes.
- 14 Q. And then what about the DK2, what is that?
- 15 A. That was the second developer kit.
- 16 Q. And what about Crescent Bay? What is that?
- 17 A. It's their third developer kit.
- 18 | Q. All right.
- 19 A. And each of these, I think, sold tens or hundreds of
- 20 thousands of units. They are kits for developers to use. They
- 21 | are not the final consumer product, but there are a lot of
- 22 them.
- 23 | Q. So when you were asked by Mr. Sammi whether this was --
- 24 you know, you had bought something that was fully done, when
- 25 was the first time that Oculus actually put out a consumer

1 product?

- A. Well, November 2015 was when our collaboration with

 Samsung -- and they put out Gear VR. That was that product.
- And then it wasn't until last year, March 2016, that

 Oculus shipped the first, you know, all Oculus-built product,

 Oculus Rift.
- Q. So that was almost two years from when you purchased them until they put out a consumer product?
- 9 A. Yes.

17

18

19

20

21

22

23

24

25

- 10 Q. And what is Touch? It looks like they came out in December.
- A. Touch are the hand controllers, because a lot of what
 we've talked about so far is just looking around and being able
 to see the world as if you're in another scene. But, you know,
 of course, you want to actually be able to change stuff in
 that.

So, you know, we talked about the ping pong experience where you have a paddle and, you know, the touch controller. It is basically this little circle that goes around your wrist with some buttons, and you can kind of pick things up in real life and move it around, and, you know, it's talking about how the -- you have a camera that can track what your position is in the world. It can also track where your hands are. So you can feel like you're in VR and that there is a ping pong paddle there, and you can move your hand to it and

pick it up and move it and actually interact in virtual reality.

So before Touch, you know, there hadn't been a great experience to do this. Other companies had built these kind of clunky wand products, but the thing about Touch is because it is just a band, you could go actually pick things up with that. If you are holding on to a wand in physical life, then you can't actually go and, like, try to pick something up because you would drop the wand, so that isn't that good.

So Touch, I think, is the first, I think, really good VR hand controller. That's, like, the key part of this experience. And, you know, that's something that, you know, Palmer was working on it when I first met him. He was pretty key to the eventual design and what ended up going into that, and this is a real innovation. It is one of the big steps forward.

when I keep saying that, you know, there are -- there are five or ten years of work to do, you know, adding hands to the VR experience is one of the key things that just came after the acquisition happened but was really key to the development. I think there are going to be, you know, three or four more big things like that over the next five years that are going to enable this to be a great experience.

Q. Let's end on that. What is the next headset set that you see, you and Oculus see in the future of virtual reality?

A. Well, the one that I'm excited about next is what we call standalones. So right now you have this mobile experience, which is kind of snap your phone into -- into a headset, and it's cool because you can take it out in the world because it is mobile, but it's a little -- the computing isn't quite as strong, the graphics don't look quite as real as when you have a full computer powering it.

But the downside of having a full computer power it is that you can't take a full computer with you, right? So it is just physically there, and you have this wire that's attached to your headset, and that's kind of clunky. So you are moving around in the world, and we want to minimize things that are reminding you that you're not actually in the place that you feel like you're in and having a wire that you might kind of trip over or something gets in the way.

So the next product that we're working on that we call the standalone is basically all the computing or as much as we can get from the -- from having a big computer but having it be in a form factor that is similar to the mobile device so you can take it anywhere you want in the world; there are no wires.

That's going to be a real big breakthrough in the experience that people can have. It will be much better than what the mobile experience is today, and you won't have the downside of having to stay in your living room and have these

```
wires around. So it's one thing. I mean, it's --
 1
 2
         Any idea when you are going to have that available to us
    as a commercial product?
 3
         You know, I'm going get it wrong if I say it, and that's
 4
    Α.
    competitive information, so --
 5
 6
         All right. We will end it on that.
    Q.
 7
         -- I wouldn't want to say it.
    Α.
 8
              MS. WILKINSON: Thank you very much.
 9
              THE COURT: Take a break about ten minutes. Don't
10
    talk about the case.
11
              SECURITY OFFICER: All rise.
12
              (Jury out)
13
              THE COURT: Okay. Anything before we --
14
              MR. SAMMI: No. Thank you.
15
              MS. WILKINSON:
16
              THE COURT: All right.
17
              (Recess at 2:30)
18
              MR. LISY: We do have one small housekeeping matter,
19
    Your Honor, before the jury comes in.
20
              THE COURT: What is it?
21
              MR. LISY: After Mr. Zuckerberg's testimony,
22
     Plaintiffs are going to play a short -- about a 15-minute video
23
     clip from an Oculus program.
24
              Ms. Keefe has something she wants to say about it.
25
              THE COURT: Do you have an objection?
```

```
1
              MS. KEEFE: A very small one, Your Honor, yes.
              THE COURT: Small or big, they are all objections.
 2
              MS. KEEFE: I have an objection, Your Honor.
 3
              THE COURT: Y'all sit down for a minute. I've got to
 4
    stand up. My back is kind of -- you can sit down.
 5
 6
              MS. KEEFE: Your Honor, the objection to the
 7
    portion -- to a portion of the testimony that Plaintiffs have
 8
    designated for Mr. Giokaris relates to the exact same issue
9
    that we talked about yesterday with respect to ripping DVDs.
10
              I want to lodge my objection that, again, we think
11
    that any of these conversations have nothing to do with the
    issues in this case, so it's 401, 402, 403, because it's
12
13
    copyrights owned by other individuals that are not alleged in
    the case, and so they are actually character evidence, bad
14
15
    acts, and don't belong here.
16
              THE COURT: Yeah, I get that, and I understand that.
    I knew at the time that it's -- I think it's a reasonably close
17
    question, and y'all lose and I get reversed on that, I don't
18
19
    mind saying that I think it's a reasonably close question. But
20
    I think I have got to give them, you know, some latitude in
21
    showing that, so I overrule your objection.
22
              MS. KEEFE: Thank you, Your Honor.
23
              MR. LISY:
                         Thank you.
24
              THE COURT: But I don't think it was yesterday.
25
              MS. KEEFE: Well, the videos were played yesterday,
```

```
but the objections made were two days ago.
1
 2
              THE COURT:
                         No, no. Do you think it was yesterday?
              MS. KEEFE: Oh, good Lord, Your Honor, no, it was not
 3
 4
    yesterday.
 5
              THE COURT: Oh, look, I like being called "good
    Lord," but I'm not.
 6
                         I promise you. You and I both know that.
 7
              MS. KEEFE:
                         Thank you, Your Honor.
              THE COURT: Your Holiness will be fine.
 8
9
              MS. KEEFE: Thank you, Your Honor.
10
              THE COURT: Okay. All right. Mr. Sammi, are you
11
    ready?
12
              MR. SAMMI:
                         I am, sir.
13
              THE COURT: Do we have kind of a time? Oh, mercy.
                          Not -- 20 minutes.
14
              MR. SAMMI:
15
                         How much?
              THE COURT:
              MR. SAMMI: 20 minutes?
16
17
              THE COURT: I mean, is that a question?
              MR. SAMMI: It is a question. It a bit of a
18
19
    question.
20
              THE COURT: Around about that?
21
              MR. SAMMI: I think so.
22
              THE COURT: Okay. That's fine. That's
23
           Whatever it is, it is. It's your time.
    fine.
24
              MR. SAMMI: Thank you, Judge.
25
              THE COURT: Okay. Let's bring them in.
```

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(Pause)
 1
 2
              THE COURT: David?
              Tell David to hold on one second. I have got to
 3
     answer this.
 4
 5
               (Pause)
              THE COURT: Here we go. Thank you.
 6
 7
              Let's bring them in, David.
 8
               (Pause)
 9
               SECURITY OFFICER: All rise for the jury.
10
               (Jury in)
11
              THE COURT: Y'all be seated. Thank y'all very much.
12
              Okay. Mr. Sammi.
13
              MR. SAMMI: Thank you, Judge.
14
                          REDIRECT EXAMINATION
15
    BY MR. SAMMI:
16
    Q.
         Hello again.
17
         Hey.
    Α.
18
         Hi. I have a few questions for you, Mr. Zuckerberg.
    0.
19
              Now, you felt that Oculus, when you met them, were
20
    about three to four years ahead, right?
21
         I think I wrote in one of the emails I thought they were
22
    about three years ahead.
23
    Q. Okay. About three years ahead, right?
24
              And getting started in VR first has an advantage,
    doesn't it?
25
```

- 1 A. Yes. I think, in general, getting started first in
- 2 anything has an advantage.
- 3 Q. But you don't know how Oculus got started, do you?
- 4 A. I think I have a good sense.
- 5 Q. Do you? Let's see. Do you know that the demos that were
- 6 given in 2012 at E3 in the ZeniMax booth by Oculus -- by John
- 7 | Carmack used id Software? Do you know that?
- 8 A. I'm not aware of that.
- 9 Q. Do you know that after that NDA that we looked at was
- 10 | signed, Palmer Luckey was transmitted VR technology from id and
- 11 | the very first demo after demo after demo that Oculus gave to
- 12 anyone was that VR technology of id's? Did you know that?
- 13 A. I haven't heard that, and I don't believe that's true.
- 14 Q. You don't -- you don't believe it's true that Oculus was
- 15 using -- VR testbed is what we call it in this trial --
- 16 software from id to demo and build a business after June 2012
- 17 | for months? You don't know that?
- 18 A. I'm not aware of that.
- 19 Q. Okay. We saw the Tuscany demo that you were talking about
- 20 with your lawyer, right?
- 21 A. Did we see it?
- 22 Q. I think we saw pictures of it.
- 23 A. Yes.
- 24 | Q. Okay. Now, have you ever seen the Rage or Doom 3 BFG demo
- 25 of id Software at ZeniMax that started Oculus?

- 1 A. I don't think so.
- 2 Q. Okay.
- 3 A. And I also try to push back on the characterization that
- 4 | that started Oculus.
- 5 | Q. Well, I just asked you, you didn't know what software
- 6 Oculus had to use in the first place, did you?
- 7 | A. What do you mean? I mean, they wrote it.
- 8 Q. No, they didn't. We just went over this.
- 9 You don't know that whether Oculus, after receiving
- 10 software from id and ZeniMax under that NDA, used only that
- 11 | software to go around and do demos and build their business.
- 12 You don't know that, right?
- 13 A. I'm not aware that that's true.
- 14 | Q. Okay. So how do you know the origins of Oculus?
- 15 A. Because I spent time with the team, and our team has done
- 16 | technical diligence, and we have looked at the code and the
- 17 lineage of the code, and we have a good sense that this is
- 18 authentic code that was built from scratch by this team, and,
- 19 you know, we know, of course, now since they've joined
- 20 | Facebook, that everything going forward is done with all the
- 21 processes that we have at the company.
- 22 Q. In all the years at Facebook since you've bought Oculus,
- 23 | since you've been working with these three gentlemen, it never
- 24 came up that they were using our demos to build their business
- 25 in 2012 after signing that NDA? That never came up?

- 1 A. Why would it?
- Q. How did it begin? Great startup you guys got here. Where
- 3 | did you get the software?
- 4 We know you started in your dorm at Harvard. We all
- 5 know that story. Wouldn't you ask Oculus how they got started?
- 6 A. We did talk about that.
- 7 Q. Apparently you didn't talk about VR testbed, Rage, Doom 3
- 8 BFG, E3, the months that Oculus took that software around; you
- 9 | didn't talk about that?
- 10 A. No. I mean, we talked about the parts of the founding of
- 11 Oculus and the start of VR that were relevant, and I think that
- 12 your client in this case probably has an inflated view of the
- 13 importance or relevance of anything that they have to VR.
- So I'm -- I'm not sure what you want me to say.
- 15 Q. Okay.
- 16 A. But, I mean it's --
- 17 Q. I just want you -- I just want to know if you know, so I'm
- 18 going to ask you another question. Okay?
- 19 Three gentlemen: Brendan Iribe, Palmer Luckey, and
- 20 Nate Mitchell -- I'm sorry, four gentlemen. Brendan Iribe,
- 21 | Palmer Luckey, Nate Mitchell, and Michael Antonov.
- Do you know who those four gentlemen are?
- 23 A. Yes.
- 24 | Q. Okay. They were very early on Oculus founders, right?
- 25 A. Yes.

- 1 Q. And --
- 2 A. Say the -- say the names again so I can confirm.
- 3 Q. Brendan?
- 4 A. Yes.
- 5 | Q. Iribe.
- Nate Mitchell?
- 7 A. Yes.
- 8 Q. Palmer Luckey?
- 9 | A. Yes.
- 10 Q. Michael Antonov?
- 11 A. Yes.
- 12 Q. Okay. Let's take those four individuals. They were
- 13 Oculus in the beginning, right? Along with Palmer -- and
- 14 Palmer Luckey started at Oculus. They were Oculus in the very
- 15 beginning, right?
- 16 | A. Yes.
- 17 Q. Okay. Now, do you know whether those four individuals in
- 18 the months after E3 June 2012 had any software of their own
- 19 that could even make the Oculus Rift work? Do you know?
- 20 A. I wasn't there at the time, so it's hard for me to give a
- 21 definitive answer as if I were, but, you know, the facts would
- 22 suggest that they clearly did, because, first of all, the demo
- 23 worked. And then, second of all, once we've done technical
- 24 analysis backward looking, you know, we, I think, are pretty
- 25 confident that they wrote the code, and that if you look at the

- 1 lineage of the code, that that's where it came from.
- 2 Q. You're talking about the demo that you saw, right?
- 3 A. No. I'm just --
- 4 Q. Is that the one you're talking about?
- 5 A. No. I'm just answering your question.
- 6 Q. Okay. You've never seen the demos that Oculus used with
- 7 people like Valve, Epic, Unity? They took it to Copenhagen.
- 8 They took it to Korea. You've never seen those demos, that
- 9 software that was written by John Carmack at id and transferred
- 10 under the NDA. You've never seen those demos?
- 11 | A. No. I'm not aware of anything that you're talking about.
- 12 Q. Okay.
- 13 A. And, you know, I think that there are a lot of demos that
- 14 a lot of different parties probably built on Oculus. It was a
- developer platform, after all, and there's no reason why I
- 16 would have seen all of them, including the ones before I
- 17 started getting interested in Oculus overall.
- 18 Q. So you suggest, sir -- you said that -- you talked a lot
- 19 with your lawyer about diligence, right? Diligence?
- 20 A. Yes.
- 21 | Q. You talked a lot with your lawyer about diligence, and
- 22 it's important, right?
- 23 A. Yes. For any deal, you want to make sure you understand
- 24 what is going on with the company, so you want to make sure
- 25 that you understand who the team is, who the key people are,

what they are like, their talent, their values. You want to
make sure that you understand what's technically there and what
the product is that's there and you want to make sure that the
company is financially sound and set up and you want to make
sure that you understand the legal infrastructure and legal
documents around the company as well as a handful of other
things that I think that we discussed before the break.

- Q. Okay. Let's hold on diligence for just a second. I need to go back to your understanding, if any, of the real origin of Oculus.
- We talked about the fact that you don't know about the Doom 3 BFG demo, the Rage demo that was transferred to Palmer Luckey under the NDA. You will agree with me that you didn't know about that, right?
- 15 A. Yeah, I mean, I'm not aware if what you're saying is true.
- 16 | Q. Now -- sure.

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Do you -- you don't know about technical information, emails, solutions, from id Software, John Carmack, for months after that NDA was signed that went into Oculus and was used by Oculus. You don't know anything about that?

- A. To the contrary, I mean, I've received reports from Brendan and others that we're quite confident that there is no other code that is used in the product.
- Q. Just set code aside. We read that NDA, right? It's got other things besides code, and there's code. And we'll get to

- 1 that in a second, but there were other things in the NDA
- 2 besides code, right?
- 3 A. Yes.
- 4 Q. Remember the long list?
- 5 A. Yes.
- 6 Q. Yeah.
- 7 Okay. When you worked with these gentlemen for years
- 8 after you bought their company, you guys never talked about,
- 9 hey, those early days and how, you know, I needed help on this,
- 10 and I asked John Carmack, and I got this solution, and it was
- 11 fun working on stuff with id.
- 12 That never came up?
- 13 A. I don't think so.
- 14 Q. Okay. Would it surprise you that there's something called
- 15 | interrogatories in this litigation where we ask the other side
- 16 questions, your Facebook, Oculus, and the individuals, and they
- 17 write these answers back that are answers from the party, okay.
- 18 | Would it surprise you that there's a whole chart
- 19 listing the very first demo E3 from Oculus and everywhere
- 20 Oculus took id Software's VR testbed and Doom 3 BFG around the
- 21 | world?
- 22 Would it surprise you that a list like that exists?
- 23 A. I certainly haven't seen that, and I'm not aware of it.
- 24 Q. But you come in here today, sir, and you say you think our
- 25 claims are meritless, but you don't know that?

A. Well, if you're asking if I know every single detail of the case, the answer is, of course, no.

And I have a legal team and a deal team, and they're really good people. And I trust them to be in the details of this, and I trust their assessment of this.

- I, of course, have been very involved with the Oculus team and the product, so I have a good sense of the people that we're dealing with here. And when my legal team says that we've looked into this and we're confident, then that definitely fits my own impression from the work that I've done with these folks.
- Q. Okay. Let's talk about diligence. Okay? You said that the most important thing in due diligence is to make sure that the product is good.

Isn't the most important thing in diligence to make sure that the technology that you're buying is actually owned by the people you're buying it from?

- A. I mean, I think you could say that these are all important things and parts of diligence.
- 20 Q. Okay.

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- A. I mean, certainly we, I don't think, would have gotten to the point of evaluating IP ownership if we didn't think that the product and technology were good.
 - So, you know, that's what I was talking about there, is, you know, we'd spent -- we had a bunch of demos, spent a

```
lot of time talking to the team and looking at demos and the
1
 2
    technology to understand that before even getting to the point
    of doing any legal or financial diligence.
 3
         You talked about diligence, and I think you said you
 4
    0.
    wanted to be clear that it wasn't that you just woke up one day
 5
     and decided to buy this company, right?
 6
 7
              Do you remember saying that?
 8
    Α.
         Yes.
 9
    Q.
         Okay. Now, what I can't figure out is if you were doing
10
    your diligence before you announced the deal, why does Facebook
    tell us that the first time Facebook ever saw the NDA -- not
11
    you, Facebook -- was on the day we sued Oculus?
12
              You never found it in any of the diligence?
13
         I don't know, but I guess that's the case.
14
15
         Okay. I'm going to buy a company for $3 billion, and the
    founder signed by his hand an NDA that covers virtual reality
16
17
    technology coming from a third party and the essence of the
18
     business itself is virtual reality technology.
19
              wouldn't that be an important document to find?
20
              MS. WILKINSON: Your Honor, I'm going to object to
21
    the mischaracterization of the evidence and the testifying
     from --
22
23
              THE COURT: Well, it's cross. I'll let him -- I'll
    let him answer that.
24
25
              Overruled.
```

- 1 THE WITNESS: You know, in general, it's the Oculus team's responsibility to produce all relevant documents. 2 can't speak to why they didn't in this case. 3 BY MR. SAMMI: 4 5 Wait. Are you saying that Oculus didn't tell you? They Q. hid it from you? 6 7 Yeah. I mean, I'm not saying they hid it, but I'm saying Α. 8 that in general, the way that this will work, as I'm sure you know, is that whether you're doing an investment or other kind 9 10 of acquisition, that the company will open up some kind of room 11 with all of their documents in it, so that way an investor or an acquirer can go in and look at all the documents. 12 13 So one of two things was the case, right? I would assume, right, either our team missed it or it wasn't in there. 14 15 Q. Okay. I don't know for a fact. You can ask plenty of other 16 17 people in this -- in this -- in this -- in this litigation, but my guess is it probably wasn't in there, and it's probably 18 19 because it wasn't an Oculus document but it was because 20 something that Palmer did separately. But, you know, I'm 21 really just speculating at this point. 22 I think so. Q. You've told us that legal diligence is "going through 23 all the legal documents to understand everything that's there," 24
 - Todd Anderson, RMR, CRR (214) 753-2170

right? That's important to diligence, isn't it?

25

```
Of course it is.
 1
    Α.
 2
    Q.
         Yeah.
              Okay. Do you remember the slide that your lawyer put
 3
    up on Project Inception?
 4
              First of all, the name Inception, is that from the
 5
 6
    movie with Leonardo DiCaprio about corporate espionage, that
 7
    one?
 8
          I would assume that when Amin came up with that name, he
    Α.
9
    was more talking about the reference to the movie where they
10
     create a reality for a person.
11
    0.
         A reality.
12
              MR. SAMMI: Okay. Let's see if I can get that slide
13
         It's DX544, and we'll go to Mr. Frank. I'll identify it
     up.
    to you by Bates number if I can. It's FB2352.
14
                                                     Just take a
15
     second.
16
              (Pause)
              MR. SAMMI: There it is. This is -- this is the --
17
18
    this is from the board slides that --
19
              THE COURT: What's the number?
20
              MR. SAMMI: Your Honor, this is DX5444.
21
              THE COURT: Oh, DX?
22
              MR. SAMMI: Yes, sir.
23
              THE COURT: Okay. Go ahead.
24
     BY MR. SAMMI:
```

This is from the slide deck that you gave to the board of

25

Q.

- 1 directors of Facebook, I think, on Sunday night before the deal
- 2 was to be announced on Monday?
- 3 A. I think that's probably true, except I don't think we
- 4 announced the deal on Monday, as you know.
- 5 Q. That's right. They announced it on Tuesday.
- Okay. Due diligence review, we went through a couple of these.
- 8 Do you see that one, Litigation, there?
- 9 | A. Yes.
- 10 | Q. Isn't it true that id Software or ZeniMax never came up in
- 11 any discussions of intellectual property on the call that you
- 12 | had with the board?
- 13 A. I don't remember, but I assume that's true. As I
- 14 | testified earlier, I had never even heard of ZeniMax at this
- 15 point.
- 16 | Q. Okay.
- 17 A. And, you know, when we had looked at -- and when we had
- 18 gone out and done our analysis of who else was in the field
- 19 and, you know, might have a claim to this, ZeniMax was nowhere.
- 20 So this is pretty standard. I mean, whenever you're
- 21 doing some kind of deal, you know, part of the diligence is you
- 22 want to understand the litigation that a company that you're
- 23 investing in or buying might be a part of.
- So, you know, it's good that we reviewed that with
- 25 the board, but from my perspective, it makes complete sense

- 1 | that this wouldn't have come up then.
- 2 Q. It's also true that nobody -- you don't remember anyone
- 3 else bringing it up, do you, on the board call?
- 4 A. I don't.
- 5 Q. Got it. Okay.
- 6 Now, we sued Oculus before you closed the
- 7 | transaction, right?
- 8 A. Yes.
- 9 Q. Okay. Now, did you tell the board of Facebook before you
- 10 closed the transaction and the money changed hands that -- I'll
- 11 take it in parts -- that you got a letter from ZeniMax and id
- 12 saying they have claims to VR property?
- 13 A. I did not personally, and I don't know if we did. But I
- 14 assume that our legal team would have given that as part of a
- 15 normal course, legal update on our business.
- 16 Q. But you don't know for a fact, right?
- 17 A. I do not.
- 18 | Q. Now, after we sent you the letter, then you know who we
- 19 are, right?
- 20 A. Once our legal team told me.
- 21 | Q. Okay. How about after we sued you -- we sued Oculus but
- 22 before you closed the deal? Did you tell the board that
- 23 Oculus, the company you're trying to buy, has been sued by
- 24 | ZeniMax claiming that it owns their fundamental technology?
- 25 A. I think I just answered that question.

- 1 Q. You didn't -- you answered the question about the letter.
- 2 Now I'm asking you about the lawsuit that came after the
- 3 letter.
- 4 A. Oh, yeah, I'm actually not sure if we would have
- 5 communicate -- even communicated to the board a letter, but
- 6 | we -- I assume we communicated a lawsuit.
- 7 | Q. Do you know that you communicated the lawsuit to the
- 8 board?
- 9 A. I mean, I don't have specific knowledge of when that
- 10 | happened, but I would assume that that's part of what the
- 11 company does, is it updates the board on litigations that the
- 12 company is a part of.
- 13 Q. That's your assumption, but as the chairman of the board,
- 14 | you can't tell us one way or the other?
- 15 A. I know that in every board meeting we have a session where
- 16 we talk about the legal update of the company, and this is part
- 17 of it, of litigations overall.
- 18 Q. Let me talk to you for a minute, sir, about a topic of
- 19 conversation that you talked about with your lawyer, and that
- 20 was Facebook trying to turn Oculus in -- from a hardware
- 21 company into a software company.
- 22 Do you remember that?
- 23 A. Yes.
- 24 Q. You talked about killer apps, right?
- 25 A. Yes.

- 1 Q. Let me get this straight. Let me use an example.
- 2 Apple sells iPhones, right?
- 3 | A. Yes.
- 4 Q. Apple has a lot of people who write software to make the
- 5 | phone work, correct?
- 6 A. Yes.
- 7 Q. That's different than software like apps that you put on
- 8 | the phone that help you sell it as well, right?
- 9 A. Yes, they do both.
- 10 Q. Yeah. One software makes the thing work -- right? -- and
- 11 the other software is an app or content, right?
- 12 A. Yeah. And there other kinds of software too. Probably
- 13 most of what Apple is doing is building the operating system,
- 14 so the UI that you use when you open up your -- when you start
- 15 | your --
- 16 Q. Exactly. So that my iPhone, which, according to Your
- 17 Honor, I didn't want it to ring, so I left it back in the
- 18 room -- my iPhone --
- 19 THE COURT: Do you want to look at this one?
- MR. SAMMI: No, that's -- I don't want to touch the
- 21 Judge's iPhone.
- 22 BY MS. SAMMI:
- 23 | Q. Here's one. So if -- I need software to make this into a
- 24 phone, otherwise, it is just a nice expensive kind of deck of
- 25 | cards, isn't it?

1 A. Yes. You need both.

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Q. Right. You need both.

Now, aren't you, in that email that we saw, talking about turning Oculus into a company that you can leverage with applications to play on a headset, virtual reality headset, or use, but you're not talking about the software that makes the Rift work itself, right?

A. That's right.

And I think there's an important distinction here. I think people would typically always call Apple a hardware company even if there is some software that goes into running what they do.

Similarly, I think most people think about Facebook as a software company or a company with software services even though we also design hardware, right? We design our own servers. We design a lot of physical stuff.

So -- so, yes, I -- I'm mostly referring to the thing that the company does, which, you know, in the case of what Oculus did, was -- the vast majority of it was hardware.

- Q. Okay. And that hardware is a nice expensive brick unless it has software that makes it actually work?
- 22 A. I think you're mischaracterizing what I'm saying --
- 23 Q. Okay.
- 24 A. -- because what you're kind of asserting is that the 25 software is the key thing and the hardware doesn't do much, and

- my point is that I think a lot of companies build both software and hardware, but the key thing that they are doing could be one or the other, and the other could just be supporting.
- When we bought Oculus, they were clearly primarily a
 hardware company. Was there some software there? Yes. But
 what we needed to do was turn them into primarily a software
 company for the strategy to work.
- Similarly, I do think you would say that Apple, even though they write some software, they are primarily a hardware company. They sell hardware.
- 11 Q. You said when you bought Oculus there was some software 12 there, right?
- 13 A. Yeah, of course.
- 14 Q. What if there was no software there?
- 15 A. Then we -- it wouldn't work, and we wouldn't have bought 16 the company.
- 17 Q. Precisely.
- And as we just covered before, you don't know what
 software Oculus did or didn't have in June, July, August,
- 20 | September, October of 2012, right?
- 21 A. I don't think that's what I said.
- 22 Q. Do you know what software they had in June, July, August,
- 23 September, October of 2012?
- 24 A. I mean, you're asking me if I was there at the time. No.
- 25 But, I mean, have we done analyses after the fact about the --

- 1 | the lineage of where it came from? Yes.
- Q. Okay. And I see your lawyer took down all the stuff I had on the board.

We know that when you try to look at the lineage, you can compare a lot of things, but you will agree with me that you can't compare things that have been wiped from computers, right?

8 A. No, I didn't say that.

4

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- 9 Q. No, I'm saying you will agree with me that you can't compare things that have been wiped from computers, right?
- A. I mean, if it's gone, then it is gone. It is hard to compare. But there are often ways that you can go back and look at how something came together.
- 14 Q. And if a Court-appointed expert in this case says 15 irretrievably gone, that means gone's gone, right?
 - A. Yes. And I guess what I'm saying, although, you know, I'm not the expert on this, but because you're asking me I want to make sure to give a complete answer, is that even if some part of code or some system is missing, you can often still tell the lineage of where it came from.

So, I mean, you will want to have someone specific to testify about that who is more of an expert on that than me, but I just want to make sure that your characterization isn't an oversimplification about not being able to trace where this came from.

```
Okay. I understand that, and we're going to get to that
 1
    Q.
 2
    testimony in this case. Thank you.
              Now, isn't this case, Mr. Zuckerberg, about whether
 3
    Oculus was built on stolen technology? Isn't that why we're
 4
    here?
 5
              MS. WILKINSON: Objection, asked and answered.
 6
 7
              THE COURT: Sustained.
 8
    BY MR. SAMMI:
 9
    Q.
         In your testimony today, you said, "It is really important
10
    to make sure the foundation you're building on is something you
    own."
11
              I think we have a slide for that.
12
13
              I made this over the -- not me. My very talented
14
    team.
15
              It's from the transcript.
               "And, you know, when you're building something, you
16
     know, like you say, it's really important to make sure that the
17
     foundation that you're building upon is something that you
18
    own," right?
19
20
              You said that?
21
    Α.
         Right.
22
         Do you remember saying it?
    Q.
              And what you mean by that is that if the foundation
23
24
    you're building on is technology you don't own, then you don't
25
    own the foundation, right? Doesn't that make sense?
```

- 1 A. I -- yeah, I agree with the point that you're making even
- 2 | if I disagree with the underlying assumption that you are
- 3 saying that we don't own the foundation.
- 4 0. Got it.
- 5 I'm saying if -- if this jury finds that the
- 6 | foundation of Oculus is stolen from ZeniMax and id, anything
- 7 you're building on it, you don't own that, right?
- 8 A. I think you need a more nuanced legal analysis of that.
- 9 I'm not sure -- I would imagine that in that case there would
- 10 be -- that would be a serious issue, but I'm not sure whether
- 11 | that implies that everything that's built on top of that is not
- 12 owned by you.
- 13 Q. Okay.
- 14 A. Because there is additional intellectual property and
- 15 contributions that are made, so --
- 16 | Q. That's like the paint and the bell on the bike, right?
- 17 You paid for the paint, you paid for the bell, but it's still
- 18 my bike?
- 19 A. I mean, I think that the analogy to a bike is extremely
- 20 oversimplistic here.
- 21 Q. Probably.
- 22 A. This would be like someone --
- 23 Q. I agree with you.
- 24 A. -- who created a piece of like a bar that might go on a
- 25 bike and then someone built a spaceship out of it.

- 1 Q. Right.
- 2 A. So, I mean, yes -- and we're kind of -- we're sitting here
- 3 talking about whether the bar was -- was taken from someone
- 4 else, and I'm saying it wasn't, but what you are saying is,
- 5 even if it was, does that mean that someone else now owns the
- 6 | spaceship? Probably not, but there would be need to be a legal
- 7 discussion about where the ownership would be there.
- 8 Q. Yes. And I think that's why -- one of the reasons we're
- 9 here.
- 10 But it is really important, right? The foundation is
- 11 | really important?
- 12 A. Yes.
- 13 Q. And in order to know about the foundation of Oculus,
- 14 | wouldn't you need to go back to those early days of Oculus to
- 15 figure out its foundation?
- 16 A. You'd certainly want to look there.
- 17 Q. Okay. And we looked at one of those documents, which is
- 18 the NDA, right? Isn't that part of the foundation of Oculus?
- 19 MS. WILKINSON: Objection, foundation.
- THE COURT: I'm sorry?
- MS. WILKINSON: Objection, foundation.
- 22 THE COURT: Sustained.
- 23 BY MR. SAMMI:
- 24 | Q. You know what NDAs are, right?
- MS. WILKINSON: Objection, asked and answered.

```
THE COURT: He has answered that. Sustained.
 1
 2
              MR. SAMMI: Okay.
 3
     BY MR. SAMMI:
 4
         I think we've asked some questions in the case, and we've
 5
    talked about whether something was used or not. Do you
     remember that? We were talking about the call you had with
 6
 7
     Brendan and, you know, whether something was used, right?
 8
    Α.
         Yes.
 9
         I want to talk to you about that concept for a second.
    Q.
10
    0kay?
11
              Do you have an explanation as to why Oculus would
12
    want to enter into a nondisclosure agreement that allows them
13
    to get virtual reality software from id and ZeniMax and they
     not want to use it?
14
              MS. WILKINSON: Objection, foundation.
15
              THE COURT: Sustained.
16
17
     BY MR. SAMMI:
         Mr. Zuckerberg, I think you've said you're also confident
18
19
    that Oculus's technology and Facebook's technology is its own.
20
     I understand your position there, and I understand that.
21
              That's your position, right?
22
         Yes. And that's -- I take this case seriously, and that's
    Α.
23
    why I wanted to come and testify in person, and that's the main
24
    message that I want to communicate, is that Oculus products are
25
    built on Oculus technology, and the --
```

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Okay. If you're confident, sir, that Oculus was built on
 1
    Q.
 2
    technology that you own, how do you explain the intentional
    destruction of evidence in this case?
 3
              MS. WILKINSON: Objection, Your Honor. Argumentative
 4
 5
    and foundation.
              THE COURT: Sustained.
 6
 7
              MR. SAMMI: Pass the witness, Your Honor.
 8
              MS. WILKINSON: No questions, Your Honor.
 9
              THE COURT: All right. You can step down, sir.
10
              Thank you. Appreciate it.
11
              THE WITNESS: Thank you.
12
              (Pause)
              THE COURT: Y'all need a break or no? Yes?
13
                                                            Maybe?
              MS. WILKINSON: I'm just going to walk him out, Your
14
15
    Honor.
16
              THE COURT:
                          Okay.
17
              (Pause)
18
              THE COURT: Don't take pictures in the hall, y'all.
19
              Okay.
20
              MS. WILKINSON: Let me clean up my podium, sir.
    Sorry about that.
21
22
              THE COURT: It's okay. All right. Are you ready?
23
              MR. SAMMI:
                         Yes.
              THE COURT: You're going to play a movie right now?
24
25
              MR. SAMMI: I'm going to play a short movie.
```

```
Plaintiffs' call by video Mr. Peter Giokaris, a
 1
    programmer at Facebook.
2
 3
              THE COURT: Okay.
              (Pause)
 4
 5
              MR. SAMMI: It's coming, Your Honor.
 6
              THE COURT: Okay.
 7
              MS. WILKINSON: Can you lower the temperature, Your
 8
    Honor?
9
              THE COURT: I will if that's what you're asking me
10
    to.
11
              MS. WILKINSON: No, thank you.
              THE COURT: In my last trial, one of the jurors wore
12
13
    a Russian hat and gloves, so -- it does keep you alert.
    Frostbite. We have had very few jurors die of frostbite but a
14
15
    few.
16
              MR. SAMMI: I'm being told about 20 seconds, Your
17
    Honor.
18
              THE COURT: It's okay.
19
              MR. SAMMI: 20, 30 seconds.
20
              THE COURT: It's technology. As great it is, it is
21
    still technology.
22
              MR. SAMMI: We don't have Mr. Zuckerberg on our side
    or John Carmack anymore for that matter.
23
24
              THE COURT: What we really need is -- what is it? --
    the 20- or 30-second clock?
25
```

```
1
              MR. SAMMI: Yes, sir.
 2
              THE COURT: That we now have in basketball.
              MR. SAMMI: The shot clock?
 3
              THE COURT: It has that huge (indicating) that goes
 4
    to the other side. That would be great.
 5
              (Pause)
 6
 7
              MR. SAMMI: It -- the computer, I think, is having
 8
    some issues. It crashed. It will just take a few minutes.
 9
              THE COURT: Do you want to call a live witness? Do
10
    you want to call your live witness?
11
              MR. SAMMI: We would play the video first, Your
12
    Honor. If you will just indulge us for just a minute or two,
13
    maybe we could --
              THE COURT: Are we going to have prayer? What are we
14
15
    going to do here?
16
              MR. SAMMI: We can tell some jokes.
              THE COURT: I'm all out of those. I'm out of them.
17
18
              (Pause)
19
              (Video played as follows:)
20
              (The witness was sworn)
21
    Q.
         Could you please state your full name --
22
              (Video stopped)
23
              MR. SAMMI: Thank you, Your Honor, for the
24
    indulgence. We're sorry about that.
25
              THE COURT: Sure, Mr. Sammi.
```

- 1 (Video played as follows:)
- 2 VIDEO DEPOSITION OF PETER GIOKARIS
- 3 (The witness was sworn)
- 4 Q. Could you please state your full name?
- 5 A. Yes. Peter Giokaris.
- 6 Q. Mr. Giokaris, where do you work today?
- 7 A. I work at Facebook.
- 8 Q. Before you worked at Oculus, did you ever see demos of the
- 9 | Oculus Rift?
- 10 A. Yes, I had.
- 11 0. In what context?
- 12 A. I saw -- they were actually at a Unity conference in
- 13 Amsterdam, which I was at. So I was able to hear Palmer and
- 14 Nate talk about the Oculus Rift, and I saw their video that
- 15 they used for their Kickstarter campaign at the time.
- 16 That was the first time I saw anything concrete about
- 17 Oculus, even though I had known about them prior to because of
- 18 | just reading about them.
- 19 | Q. Got it.
- 20 A. The first time I saw a demo of something on the Rift was
- 21 when I went in and talked to them.
- 22 Q. And so when was this meeting?
- 23 A. October 31st of 2012.
- 24 | Q. And so what did you see -- did you try on a Rift?
- 25 | A. Yes.

- 1 Q. What did you see?
- 2 A. I saw Rage, the demo Rage.
- 3 | Q. Okay.
- 4 A. And I also saw Doom.
- 5 Q. So what did you think when you tried on the Rift as
- 6 compared to what you were working on?
- 7 A. I was very impressed with it.
- 8 Q. Okay. Why?
- 9 A. The graphics were very sharp. The field of view was
- 10 amazing, and the latency was very low. And it was very light.
- 11 | Q. And so when you say the graphics were sharp, that was on
- 12 Doom?
- 13 A. The graphics were great. Yeah, they --
- 14 Q. On Doom?
- 15 A. I wouldn't say "sharp." They were actually beautiful.
- 16 | Q. On Doom?
- 17 A. No.
- 18 | Q. On what?
- 19 A. On Rage.
- 20 Q. On Rage?
- 21 A. Yes.
- 22 Q. Okay. How was the distortion?
- 23 A. The distortion looks really good.
- 24 Q. Okay.
- 25 A. As far as -- there wasn't -- like, as far as lack of, it

- 1 really, you know, blew my mind how -- you know, how good it
- 2 was, and, you know, depend -- based on the fact that the field
- 3 of view was so large.
- 4 Q. Did you have an understanding at that time as to whether
- 5 Mr. Luckey was a software developer?
- 6 A. I did not.
- 7 Q. Okay. Do you have any understanding about whether
- 8 Mr. Luckey today is a software developer?
- 9 A. I do know that he's not a software developer.
- 10 Q. Was John Carmack ever discussed during your four-hour
- 11 | meeting at Oculus on October 31, 2012?
- 12 A. Seeing that I was playing Doom as a demo, I don't recall
- 13 | if his name came up, but if it did, it would have been in the
- 14 | context of the demo.
- 15 Q. Did you mention the name John Carmack?
- 16 A. If I did, it would've been because of the demo that I had
- 17 seen.
- 18 | Q. Okay. And what would you have said?
- 19 A. I'm not sure exactly what I would've said, except his name
- 20 would've come up if I was playing a game of Doom, knowing that
- 21 Doom was John Carmack.
- 22 Q. And you knew that Doom was John Carmack?
- 23 | A. Yes.
- 24 | Q. Okay. What about Rage? You know that Rage is John
- 25 | Carmack?

- 1 A. At the time, I didn't know until I was told.
- 2 Q. Okay. Did you have to sign any NDA or anything prior to
- 3 your meeting?
- 4 A. No.
- 5 | Q. So let's talk about some of your work that you did at
- 6 Oculus when you started there.
- 7 | A. Okay.
- 8 Q. You were a coder, right?
- 9 A. Yes.
- 10 Q. So did you ever work on a fisheye shader for Unity
- 11 integration?
- 12 A. Yes.
- 13 Q. Okay. And can you tell me what that is?
- 14 | A. Sure.
- So a fisheye shader or a barrel distortion, lens
- 16 correction shader, would be something that would correct the
- 17 distortions that become evident when looking through a lens at
- 18 a flat screen.
- 19 Q. Okay. And so what -- what was your role in -- in that at
- 20 Oculus?
- 21 A. I needed to integrate a lens correction into Unity in
- 22 order for it to work properly.
- 23 Q. Did you wind up doing that?
- 24 A. Yes.
- 25 Q. Did you write code to integrate a lens correction into

- 1 Unity?
- 2 A. I did.
- 3 Q. I'm going to hand you what's been marked as Giokaris 1,
- 4 | which is a file called fisheyeshader.shader produced from a
- 5 production called Oculus-production-Perforce.TC.
- 6 Do you recognize this?
- 7 A. I do.
- 8 Q. Can you tell me generally what it is?
- 9 A. This is a source code in text file for doing a fisheye
- 10 | shader for the Unity integration of the Rift.
- 11 | Q. Okay. So if you can help me, can you --
- 12 A. Sure.
- 13 Q. -- help me understand what Giokaris 1 does?
- 14 | A. Sure.
- So this is a lens shader code, which is meant to
- 16 correct the distortion lens of the Rift.
- 17 Q. And all of this does that?
- 18 A. Not all of it.
- 19 Q. What portion is primarily directed towards correcting that
- 20 which you described?
- 21 A. The portion that -- this is a -- so this is the first
- 22 check-in, I believe, or a first check-in of the code. It shows
- 23 two different warp functions, HMD warp and HMD warp 2.
- 24 Q. And can you tell me what that portion of code is doing?
- 25 A. This is a function that will -- it's actually a function

- 1 that will correct the lens -- correct for the lens distortion
- 2 of -- of a render buffer, which is what a flat -- which is a
- 3 | flat pixel -- or, sorry, a flat square that gets rendered to in
- 4 traditional graphics.
- 5 | Q. So we were just talking about HMD warp 1, which is around
- 6 line 31 to 42?
- 7 A. Yes.
- 8 Q. And can you tell me about HMD warp 2, where that is?
- 9 A. So HMD warp 2 is -- has the same functionality as HMD
- 10 warp 1, or is meant to have the same functionality. They're
- 11 just different implementations.
- 12 Q. And what lines is HMD 2? What lines --
- 13 | A. Oh, line --
- 14 Q. -- are directed toward HMD warp 2?
- 15 A. Line 44 to line 59.
- 16 | Q. Why are there two?
- 17 A. One of them is a derived version of code that was seen
- 18 within a -- the -- I believe the Rage demo. There was a shader
- 19 | file there, and that was used. And I believe I looked at it
- and played with it to see what the outputs would be on it.
- 21 | Q. What --
- 22 A. The other one is an internal one that was written
- 23 | internally.
- 24 Q. So which is which?
- 25 A. I don't recall now. I believe the first one is ours, as

- 1 far as within Oculus, and the other one is the derived version
- 2 from what I was looking at when I was looking at some of the --
- 3 when I was looking at the source that was within Rage.
- 4 Q. And do you know where this source that was within Rage
- 5 came from?
- 6 A. Well, I would -- the source came from the creator of Rage,
- 7 | which would be John Carmack.
- 8 Q. And how did you get ahold of that?
- 9 A. I was given access to it from Oculus.
- 10 Q. By whom?
- 11 | A. I believe it would've been Michael Antonov.
- 12 | Q. What part of Giokaris 1 did you write?
- 13 A. What part of Giokaris 1 did I write? I wrote everything.
- 14 | I wrote all this code.
- 15 Q. How about the comment on line 49, did you write that
- 16 | comment?
- 17 | A. I do not recall.
- 18 Q. But you -- you still -- you wrote everything in Giokaris
- 19 | 1?
- 20 A. Well, being that I had -- actually was playing with the
- 21 | source that was already there and trying to fit into Unity, it
- 22 might have been a copy and paste.
- 23 | Q. Okay. What might have been a copy and paste?
- 24 A. Those -- those lines that you just pointed to.
- 25 Q. So the lines that I'm discussing, for example, in HMD 2 --

1 HMD warp 2 could have been a cut and paste from Rage code into 2 this code in Giokaris 1, which was checked into Oculus Perforce? 3 4 Α. Yes. 5 Can you tell me why you cut and pasted HMD warp 2 into Q. Giokaris 1? 6 7 Α. Sure. 8 Basically, I saw the file within Rage, which was 9 given to me to use as a testbed for the work that I was work --10 that I was doing. And looking at the code, I thought it would be great to see if I could get that to work, as a means of 11 exercise to understand different types of distortion. 12 13 Okay. I'm going to hand you what's been marked as Q. Giokaris Exhibit 3. 14 15 (Video stopped) 16 MS. WILKINSON: Objection. 17 Your Honor --18 THE COURT: Oh, there's something besides what was --19 MS. WILKINSON: Yeah, there's two things, Your Honor. 20 And I don't think you told the jury that both their 21 designations of the deposition get played and ours, and the one 22 of ours that said it didn't work, they didn't play. 23 MR. SAMMI: First of all, there's no implication of intentionality. 24 25 THE COURT: No, no, I agree with that. There is not

any of that, but are we going to play theirs? 1 2 MR. SAMMI: Yeah. We're playing theirs, right? (Video played) 3 4 BY MR. SAMMI: And did -- did you get it to work? 5 Q. I believe I did not. 6 Α. 7 You did not. Q. 8 And do you know why you didn't get it to work? 9 Α. The output was just not correct. 10 (Video stopped) MR. SAMMI: I'm trying. I'm trying my best. 11 12 THE COURT: Stop it. Stop it. 13 MS. WILKINSON: Can I ask you to go back to the question before this? 14 15 MR. SAMMI: If you can just read the line number, 16 we'll go back to any question. 17 MS. KEEFE: Go back to page 83, line 2. 18 MR. SAMMI: Page 83, line 2. 19 (Video played) 20 BY MR. SAMMI: 21 Can you tell me why you cut and pasted HMD warp 2 into Giokaris 1? 22 Sure. Basically I saw the file within Rage, which was 23 24 given to me to use as a testbed for the work that I was work --25 that I was doing. And looking at the code, I thought it would

- 1 be great to see if I could get that to work as a means of
- 2 exercise to understand different types of distortion.
- 3 | Q. And did -- did you get it to work?
- 4 A. I believe I did not.
- 5 Q. You did not.
- 6 And do you know why you didn't get it to work?
- 7 A. The output was just not correct. I was not getting -- I
- 8 | was not getting the values that I wanted to -- or I just wasn't
- 9 getting the output that I expected, and I ended up using a
- 10 different source base, which did work.
- 11 0. And what was that other source base?
- 12 A. It was a source that -- that was within the Oculus SDK
- 13 | that was given to me.
- 14 Q. Okay. And what was that?
- 15 A. It was a source code that was used to do lens distortion
- 16 at the C++ level.
- 17 | Q. And what was it? From where did that come?
- 18 A. From where? From the Oculus SDK that Michael Antonov
- 19 provided me.
- 20 | Q. And do you know if Michael Antonov wrote that?
- 21 A. I don't know if he wrote that.
- 22 Q. Do you know who is the author of that?
- 23 A. I would speculate this would have been either Michael
- 24 | and/or Andrew Reisse, who was our graphics expert at the time.
- 25 Q. I'm going to hand you what's been marked as Giokaris

- 1 | Exhibit 3, which is a file -- a source code file entitled
- 2 OVRlenscorrection.shader@366.
- 3 Do you see that?
- 4 A. I do.
- 5 | Q. So can you tell me what generally Giokaris 3, the code in
- 6 | Giokaris 3, is directed towards?
- 7 A. So this code is a rename of -- of the fisheye shader.
- 8 It's a further iteration down the line of this shader, and it
- 9 | includes three different HMD warp functions.
- 10 Q. Let's start with the third one.
- 11 A. Okay.
- 12 Q. The third one is the same code from the Rage demo as is
- 13 | found in Giokaris 1, correct?
- 14 A. I believe it is. I'm just looking through it just to make
- 15 | sure.
- 16 (Pause)
- 17 A. Yes, it's the same code.
- 18 Q. Why did you leave it in?
- 19 A. Well, it's been, you know, a form of reference just to
- 20 have different ways of looking at the same functionality.
- 21 | Q. At any of the companies that you were working at, did any
- 22 of your bosses ever send you forwards of emails that contained
- 23 | source code from outside the company?
- 24 A. When I first started, there was potentially email --
- 25 emails of that nature.

- 1 Q. And what's the culture of start-ups, to your
- 2 understanding?
- 3 A. Faster, just more loose, I guess is the term, but --
- 4 Q. Do you think it's appropriate to use another company's
- 5 | source code for the benefit of the company you're employed at?
- 6 A. I feel if the code was given to the company to use, then
- 7 | it would be okay.
- 8 Q. Have you ever ripped intellectual property for Oculus --
- 9 A. I have not ripped property for Oculus.
- 10 I'd like to mention --
- 11 Q. Sure --
- 12 A. -- YouTube.
- 13 Q. Uh-huh.
- 14 A. And borrowing or taking video from there in order to use
- 15 | that.
- 16 | Q. Okay.
- 17 | A. So --
- 18 Q. And in what capacity did you take video from YouTube and
- 19 | use it?
- 20 A. That was to be used in an application that I was working
- 21 on.
- 22 Q. Okay. What type of videos did you take from YouTube?
- 23 A. Basically trailers from movies.
- 24 Q. Okay. And did you -- did -- who told you to do that?
- 25 A. I did it because I was required to -- I needed data in

- 1 order to use it for the application that I was working on.
- 2 Q. And did anybody else know that you were doing that at
- 3 Oculus?
- 4 A. Yes.
- 5 Q. Who did?
- 6 A. Brendan Iribe would know.
- 7 Q. Brendan Iribe?
- 8 A. Yes.
- 9 Q. Anyone else?
- 10 A. Nate would have known that I was also getting content from
- 11 YouTube.
- 12 Q. Okay. Anyone else?
- 13 A. At that time, I think they were the two main -- Palmer
- 14 | Luckey probably knew as well. I'm sure I talked to him about
- 15 what I was doing -- what I was working on at the time.
- 16 | Q. Okay. Do you recall the names of any of that type of
- 17 | software that allows you to get videos off of YouTube?
- 18 A. I'm trying to think. At this point, I don't recall.
- 19 Q. Did you pay for that software?
- 20 A. No.
- 21 (End of video)
- THE COURT: Do you-all have some more to play?
- MS. WILKINSON: Yes, Your Honor.
- 24 MR. SAMMI: Yes, lines -- at the very end?
- MS. WILKINSON: Yeah.

```
MR. SAMMI: Can we play -- I apologize for this --
 1
 2
     236:16 to 17 and 236:19.
 3
               (Pause)
              MR. SAMMI: It's the two -- can I have the line
 4
     numbers again?
 5
 6
              MS. WILKINSON: Sure.
 7
              MR. SAMMI: Can I borrow this for a second?
 8
              MS. WILKINSON: Sure.
9
              MR. SAMMI: This.
10
               (Pause)
11
              MR. SAMMI: 236, lines 16 through 17, and 236,
     lines 19 through to 237, line 1.
12
13
               (Pause)
              MR. SAMMI: I wish I could play some elevator music
14
15
     right now, Judge.
16
              Can you explain -- Your Honor, may Mr. Lisy explain?
17
              MR. LISY: I think there's just a question about
18
    whether these designations were made, Your Honor. We don't
19
     have an objection to them, so we will play them now.
20
              THE COURT: Just play them.
21
               (Video played as follows:)
22
         Why did you need 3D trailers for the Oculus Rift Cinema
    Q.
23
    project?
          I required 3D content in order to view movies in 3D on the
24
25
    Rift.
```

```
1
         For what purpose?
    Q.
 2
         It was part of a cinema application that was actually
    within Unity that was built in Unity, and it was -- it required
 3
    content to be driven in 3D in order to -- proof of concept of
 4
    how it worked.
 5
         Okay.
 6
    Q.
 7
              (End of video)
 8
              THE COURT: Is that it?
 9
              MR. SAMMI: Yes, Your Honor.
10
              THE COURT: Everything on the video?
              MR. SAMMI: Everything is on the video, Your Honor.
11
              And may I move to enter two exhibits, PX1015 and
12
13
    PX1074.
              MS. WILKINSON: No objection.
14
15
              THE COURT: All right. That are admitted into
16
     evidence.
              (Plaintiffs' Exhibit No. 1015 and 1074 received)
17
18
              MR. SAMMI: Thank you, Your Honor.
19
              THE COURT: Is that it? Do you have another movie?
20
              MR. SAMMI: We have a live witness, Your Honor.
21
              THE COURT: You do?
              MR. SAMMI: We do. No technical difficulties there.
22
23
              THE COURT: I don't know about that. We will see.
24
    You never know.
25
              Is this a long, short witness?
```

```
1
              MR. SAMMI:
                         I believe it's a longer witness, a long
2
    witness, yes, sir.
              THE COURT: A long witness?
 3
              MR. SAMMI: A long witness.
 4
 5
                         I will let you go another 40 minutes.
              THE COURT:
 6
              MR. SAMMI: Okay.
 7
              THE COURT: Call your next witness.
 8
              MR. PHILBIN: Your Honor, the Plaintiffs call
9
    Mr. Palmer Luckey to the stand.
10
              THE COURT:
                          Okay.
11
              (Pause)
12
              THE COURT: Thank you.
13
              MR. KARSON: Thank you, Your Honor.
              (Pause)
14
15
              THE COURT: Just a second, Mr. Luckey.
16
              Mr. Jacobson.
17
              THE CLERK: Raise your right hand.
              (The witness was sworn)
18
19
              THE COURT: All right. Mr. Luckey, take a seat right
20
    there next to me.
21
              Do you have any fresh water?
22
              THE WITNESS: There's a water there. I will just use
           I'm sure it will be fine.
23
    that.
              THE COURT: Wait, wait. We're not going to
24
25
    have you do, you know, backwash. No, I'm not doing that. Give
```

```
1
    me that.
              THE WITNESS: Thank you, Your Honor.
 2
 3
              THE COURT: Gosh. Mr. Sammi.
              MR. SAMMI: It wasn't planned.
 4
 5
              THE COURT: Come on.
              MR. SAMMI: Of course, there is plenty of water.
 6
 7
              THE WITNESS: Let me pre-break the cap so it is
 8
     ready.
 9
              THE COURT: Mr. Philbin, are you ready? Are you
10
    going to need that screen?
11
              MR. PHILBIN: Perhaps, Your Honor. I believe so.
12
              THE COURT: We will turn it up just a little bit
13
    until you get to that.
              Okay. Go ahead, Mr. Philbin.
14
15
              MR. PHILBIN: Thank you, Your Honor.
16
               PALMER LUCKEY, PLAINTIFFS' WITNESS, SWORN
17
                            DIRECT EXAMINATION
18
    BY MR. PHILBIN:
19
         Mr. Luckey, would you introduce yourself to the jury,
20
    please?
         My name is Palmer Luckey. I'm the founder of Oculus and
21
22
    the designer of the Rift.
23
         You're Palmer Freeman Luckey, right?
24
         Yes. I don't usually use that as part of my name, but it
25
    is my middle name.
```

- 1 Q. You're one of the defendants in this case, correct?
- 2 A. Yes, I am personally named in this case.
- 3 Q. You founded Oculus in April 2012, correct, sir?
- 4 A. I started using the name internally sometime in late 2011,
- 5 and I started publicly using it in March of 2012, I think, and
- 6 | I incorporated the company formally as a limited liability
- 7 corporation in June in preparation for the launch of my
- 8 Kickstarter.
- 9 Q. By April 2012, you were holding yourself out as the
- 10 | founder of Oculus, correct?
- 11 A. I was the founder of Oculus.
- 12 Q. As early as April 2012, correct?
- 13 A. Like I said, I had been using it internally and privately
- 14 earlier. I first publicly started using it -- I think it was
- 15 of March 2012, not April, but it was around that time.
- 16 Q. Understood.
- So we can move that date to when you publicly
- 18 announced you had founded Oculus as early as March 2012,
- 19 | correct?
- 20 A. Yeah, that sounds right.
- 21 | Q. And Oculus is another one of the defendants in this case,
- 22 | correct?
- 23 A. Yes.
- 24 | Q. And as you sit here today, you work for Facebook, correct?
- 25 A. That's right.

And Facebook is another defendant in this case, correct? 1 Q. 2 Α. Yes. 3 Q. And Facebook --4 THE COURT: Stop. Stop, stop. Turn his 5 microphone down. Are you on? 6 7 THE CLERK: He's on. 8 THE COURT: He's just not loud enough. MR. PHILBIN: Do I need to talk louder? 9 10 THE COURT: No. 11 who controls -- do we control his? 12 THE CLERK: I do. MR. PHILBIN: Is that better? 13 THE COURT: That is a little too loud. There we go. 14 15 Okay. Keep going. We will work on it. BY MR. PHILBIN: 16 17 All right. Facebook acquired your company Oculus in 2014, Q. correct, sir? 18 19 That's correct. Α. 20 And as the founder of Oculus, you personally stand to make Q. over \$200 million as a result of Facebook's acquisition of 21 22 Oculus, correct, sir? The amount of money depends on -- it's dependent on 23 24 whether I stay employed for several more years. There is also 25 a certain amount that gets paid out if we hit certain

- milestones, and then it depends on what the Facebook stock price is.
- But it will probably end up being in the hundreds of millions, assuming I continue to be employed and we hit all of our milestones.
- Q. Let's say you just stay employed. How much money do you
 stand to receive as a result of the Facebook acquisition of
- 9 A. I'm not sure. I'm not sure exactly what the breakdown is.

 10 Some of it was in cash. Most of it was in Facebook stock, and
- the price goes up and down. I'm not exactly sure what it would end up being, but it is in the hundreds of millions.
- 13 Q. In the hundreds of millions of dollars?
- 14 A. Yes.

Oculus?

8

- 15 Q. And you can't be any more accurate than in the hundreds of millions of dollars?
- 17 A. Well, I mean, you're talking about if I was employed.
- 18 I'll have to be employed for several more years before this
- 19 | hypothetical could play out, and so, yeah, I can't be more
- 20 accurate. I mean, Facebook stock has -- has gone up and down
- 21 | significantly in the time since the acquisition, and it's even
- 22 | longer until I hit all of my earnouts and vesting agreements.
- 23 | Q. And can you tell the jury how much money you've made today
- 24 as a result of Facebook's acquisition of your company Oculus?
- 25 A. It's in the tens of millions.

- 1 Q. That's as accurate as you can guess, within 10 or
- 2 | \$20 million?
- 3 A. So I got about 40 or \$50 million close to when the
- 4 acquisition occurred. I have gotten several tens of millions
- 5 more since then, much of which was in Facebook stock. I can't
- 6 be really accurate. I think it's -- it's in the tens of
- 7 | millions. It's over -- it's over \$50 million for sure.
- 8 Q. And you stand to make hundreds of millions of dollars
- 9 more, correct?
- 10 A. Yes, I do.
- 11 | Q. In 2012, you sent a headset to Mr. Carmack, correct?
- 12 A. Yes, I did.
- 13 | Q. Was it on May 10, 2012?
- 14 A. That sounds like it's probably correct. I'm not sure if
- 15 | that's the exact date.
- 16 | Q. And you packaged your headset into a United States Postal
- 17 | Service medium-sized box, flat rate Priority, correct?
- 18 A. That's not an accurate representation of the box.
- 19 USPS actually makes several different medium-sized
- 20 boxes in different shapes. Some are longer, some are boxier.
- 21 | There are actually several different sizes, but they are all
- 22 USPS flat rate boxes.
- That is a USPS flat rate box, but I guess my point is
- 24 | that's not actually the same shape or size as the box that I
- 25 used, but it's pretty similar. I just wanted -- I just want my

- 1 testimony to be completely accurate.
- 2 Q. And we asked you under oath if you put what you sent to
- 3 Mr. Carmack in a USPS regular mailbox, and you answered United
- 4 | States Postal Service flat rate Priority box, correct?
- 5 A. And what I'm saying is there is more than one USPS medium
- 6 | Priority box. There are actually several different shapes and
- 7 | sizes of box that are all classed under the medium flat rate
- 8 fee. There's also a small one, there's also a large one.
- 9 For example, I believe that there is a long and flat
- 10 wide mailer that is small. There is another that is kind of a
- 11 | cube that is small. So just for the sake of being accurate, I
- 12 | just want to point out that box is not an accurate
- 13 representation, but it is also a USPS Priority flat rate
- 14 | medium -- medium-scale box.
- 15 0. The box too tall?
- 16 A. It's actually just much too narrow. The box that I used
- 17 was one of the more squared ones. The headset wouldn't have
- 18 begun to fit into that particular box.
- 19 Q. So your box was wider and shorter?
- 20 A. Yeah. It was similar in size to the box that -- that the
- 21 prototype is currently housed in.
- 22 Q. We can agree that what you sent to Mr. Carmack was, in
- 23 | fact, in a box, right?
- 24 A. Yes. I had to put it into a box so that I could send it
- 25 through the postal service and get it to him, because, well,

- 1 | that's the best way to move physical goods.
- 2 0. You were in the courtroom when Mr. Carmack testified about
- 3 | what was in the box, correct?
- 4 A. Yes, I was.
- 5 Q. Did Mr. -- and Mr. Carmack testified about what was in the
- 6 box when he received it, right?
- 7 A. Yes, he did.
- 8 Q. Now, you know what was in the box when you sent it, right?
- 9 | A. I do.
- 10 Q. So does Mr. Carmack's testimony about what was in the box
- 11 when he received it, does it match with what you understand was
- 12 in the box when you sent it?
- 13 MS. WILKINSON: Objection, Your Honor. He can ask
- 14 him what he thought was in the box. Characterizing somebody
- 15 | else's testimony, I don't think, is appropriate.
- 16 THE COURT: Unfortunately, I had a little hard time
- 17 following all that. I'm sorry.
- 18 MR. PHILBIN: All right. Let me see if I can break
- 19 it down, Your Honor.
- THE COURT: Try to simplify that a little bit for me.
- MR. PHILBIN: Sure.
- 22 BY MR. PHILBIN:
- 23 | Q. You were sitting in this courtroom when Mr. Carmack
- 24 | testified what came out of the box?
- 25 A. Yes, I was.

- 1 Q. Okay. Now, when Mr. Carmack testified about what came out
- 2 of the box, does that match your understanding of what went in
- 3 the box?
- 4 A. Generally speaking. There were some things that weren't
- 5 discussed because you didn't ask about it. For example, the
- 6 | thing that came to mind was that I had some packaging in there
- 7 and some shockproofing and things to make sure it didn't get
- 8 damaged.
- 9 Those weren't discussed because you didn't ask about
- 10 | it. But, generally speaking, I think we're aligned on what was
- 11 inside of the box as far as things of significance go.
- 12 Q. So we're missing bubble wrap; is that right?
- 13 A. So bubble wrap -- also I believe I made some cardboard
- 14 | spacers. If you've ever gotten a laptop in the mail, for
- example, inside the box might be cardboard assemblies that kind
- 16 of go on the edge to make sure that it doesn't get crushed or
- 17 | rattle around inside the box.
- 18 Bubble wrap, I don't think was one of the things that
- 19 | I used, but it serves the same purpose, to protect the unit
- 20 | from damage during transit.
- 21 | Q. Did you put anything else in the box that Mr. Carmack
- 22 | didn't testify came out of the box?
- 23 A. I'm not sure. I don't really remember all of
- 24 Mr. Carmack's testimony, but I don't think that there's
- 25 anything that we disagree on.

- 1 Q. Okay. And the substance of what you've put in the box was
- 2 your prototype, correct?
- 3 A. That is correct.
- 4 Q. And your prototype was basically a rectangular device,
- 5 correct?
- 6 A. Some parts of it were rectangular. It was actually
- 7 | multiple rectangles that were put together. But, yeah, the
- 8 main housing was mostly rectangular with some rounded edges.
- 9 Q. And the rectangular with the rounded edges had a display
- 10 inside it, correct?
- 11 A. Yes, it did.
- 12 Q. In addition to the display in the rectangular box, there
- 13 | was also a VGA control board; is that correct?
- 14 A. There was a display controller that basically takes the
- 15 | video signals that come out of your graphics card and turn them
- 16 into the type of signaling that the display itself can use.
- 17 So you -- you could call it a VGA controller. More
- 18 technically speaking, it is a card that takes a VGA video input
- 19 and then converts it into an LVDS video signal that is able to
- 20 | drive the panel directly.
- 21 Q. Did you invent any part of that?
- 22 A. I certainly didn't invent, you know, the concept of video
- 23 driver boards. The one that I was using was an off-the-shelf
- 24 | board that you could flash with various firmwares that allowed
- 25 | it to drive different displays.

So you could use this to drive a small display like I did or you could also use it to drive a very large display panel like is used in television. You just have to flash it with the right firmware, with the right timings to drive it over the LVDS link.

The one that I was using, I had flashed with the proper firmware and also made quite a few modifications to it to reduce the size and weight and also to make it more power efficient because it was not really designed to be USB-powered. It was designed to be powered originally off of a much higher voltage power supply.

I -- just that I want to be clear. I don't -- I'm not saying I invented it, but it certainly was not just a generic off-the-shelf part. It had quite a few modifications and things of my own design that I added.

- Q. You trimmed down the size of some of the pins; correct?
- 17 A. That's one of the things I did, yes.
 - Q. And that's -- the chip inserts through a card, and there's pins that stick out on the other side, correct?
 - A. That's one of -- that's one of the things on the board.

Basically, they're called through-hole components, and there were some components -- one of the things I did to reduce the size and weight was basically trim the leads of components that stuck through the boards. So before they put them through the board, you soldered them in place, and there

- were bulges on the bottom of the board. I was able to trim all
- 2 of those off which made for a lower profile system.
- 3 Q. And the Rift prototype in this box had two lenses that
- 4 | were mounted to the front faceplate, correct?
- 5 A. Yes, they were 7X aspheric magnifiers that were made out
- 6 of acrylic.
- 7 Q. And the prototype you put in the box also had neoprene
- 8 | foam light covers on the outside to block out the light from
- 9 the outside world, correct?
- 10 A. Yes, that's correct.
- 11 Q. You put cabling in the box as well, correct?
- 12 A. It's not so much that it was cabling in the box. The
- 13 cabling was actually integrated with the head-mounted display.
- 14 | The way that I designed, you didn't have a cable that you
- 15 plugged into the head-mounted display and then into your
- 16 computer. It was actually hardwired on one end directly to the
- 17 display control board, so you can think of it kind of like a
- 18 television or a monitor that has a cable that is permanently
- 19 built into it which allows it to be lighter and more
- 20 comfortable and ergonomic and also just saves the weight and
- 21 complexity of having a connector that can go bad.
- 22 Q. A cabling plugged into the display, correct?
- 23 A. Well, not -- not plugged -- not -- if it had had -- had
- 24 | it, then yes. My point is there was no plug for any cabling on
- 25 the head-mounted display. Basically it was a plug on one end

- 1 of your graphics card. The cable then ran to the head-mounted
- 2 display where the cable was wired directly to the display
- 3 | controller board.
- 4 O. Understood.
- And the display on the headset that was in this box
- 6 was a generic 5.6-inch LCD display, correct?
- 7 A. I wouldn't describe it as generic. I mean, you -- it was
- 8 a 5.6-inch display that was originally designed for the
- 9 ultra-mobile PC market. It was designed by BOE Hydis for use
- 10 in the Fujitsu U810 ultra-mobile PC which was essentially a
- 11 | very small laptop. And at the time it was a very high
- 12 resolution, high refresh rate display with really high color
- 13 depth for something of that size and weight.
- But I wouldn't call it a generic display. I'm not
- 15 | sure what would be generic about it.
- 16 | Q. You didn't build the display, did you?
- 17 A. No.
- 18 | Q. You bought it off the shelf, didn't you?
- 19 A. Yes. Display fabrication is something that -- well, the
- 20 costs usually go in -- at least in the tens of millions and
- 21 often up into the billions to build a fabrication line. Very
- 22 | few people can claim that they have made a display themselves.
- 23 | Samsung would be one of the very few exceptions, for example.
- 24 Q. You didn't alter the latency characteristics of the
- 25 display panel, did you, sir?

A. I mean, no, the display panel itself didn't have any latency characteristics altered. The display controller is actually usually where latency is introduced in a video display system. The panel itself is kind of a known quantity. What you get is what you get.

You can overdrive it using -- you can basically tell your graphics card to overdrive it and try to get it to switch values faster, but there's not much you can do to a panel to actually make it switch faster. You can modify it to be lighter or to have higher brightness or to be stronger, which I did do on this particular panel, but there's not really much you can do in most cases to modify a panel to be lower latency.

- Q. So the answer to my question is no, you didn't modify the latency characteristics, correct?
- A. Yes. I just wanted to give background.

Just to make clear, it's not the type of thing that you really can modify on a display. Like, the display is made with -- the display is made to be driven and switched at a given speed. Generally speaking, you can't modify a display to make it go faster. There are, of course, exceptions.

- Q. You didn't build the VGA card either, did you, sir?
- 22 A. No. I purchased a -- I purchased the display controller
- 23 from a vendor online and then performed my modifications on it.
- 24 Q. It was a general purpose card, correct?
- 25 A. I would say it was more of a universal card than general

- 1 purpose, in that it can -- it can only provide one purpose
- 2 based on which firmware you have flashed on it at any given
- 3 moment. Once you do that, it is specialized, but you're able
- 4 to make it work with a lot of different things.
- 5 | Q. In this case didn't you testify that you didn't build the
- 6 | VGA card. It was a generic general purpose card?
- 7 A. I could imagine myself describing it that way if the
- 8 question were asked in a certain way.
- 9 Q. When you were asked, did you build the VGA card -- would
- 10 you like to see it?
- 11 A. I don't need to see it. I'm very familiar with what it is
- 12 and what it looks like.
- 13 Q. No, I'm talking about your deposition. Would you like to
- 14 | see your prior sworn testimony where you were asked, "Did you
- 15 | build the VGA card?"
- 16 And you first answered, "The what?"
- 17 And then the question was, "The VGA card."
- 18 And then your answer was, "I did not build the VGA
- 19 card. It was the generic general purpose card."
- 20 | would you like to see that testimony or is that --
- 21 A. No, no. I believe it. Like I just said, I did not
- 22 build it.
- THE COURT: Stop.
- MS. WILKINSON: Your Honor, just for proper purposes,
- 25 | I think if we could have a page and line number --

1 MR. PHILBIN: Sure. 2 MS. WILKINSON: -- to follow along. MR. PHILBIN: It's Mr. Luckey's deposition from 3 4 January 26, 2016, starting on page 90 at line 10 through 5 line 14 and 15. 6 MS. WILKINSON: Thank you. 7 MR. PHILBIN: You're welcome. 8 BY MR. PHILBIN: 9 Q. Do you stand by that testimony, sir? 10 Yes, I do. Α. 11 And the lenses -- the lenses that you put in the box cost Ο. 12 you less than \$10.00 a piece, correct? 13 I'm not -- I'm not sure, but I -- that's in the right --Α. that's in the right ballpark. 14 15 One of the problems with using cheap lenses is that there is significant geometric distortion, correct, sir? 16 It's not a problem with cheap lenses. It's a problem with 17 Α. 18 high magnification lenses in general. Like, whether they're 19 cheap or not, expensive or not, if you only have a single 20 element -- an element is an -- an element is just basically a single lens component, not, you know, multiple lenses in a 21 22 stack. 23 It's not the expense that determines it. If you only 24 have one lens element and you want to have high magnification, 25 which you need to reproject a wide field of view image, you're

1 generally going to have a lot of geometric distortion. But I 2 just want to be clear it's not a matter of the cost. It's a matter of how much magnification you want to try to give -- get 3 out of a lens, and you can change that slightly depending on 4 the materials that you use for the lens. But it's not -- it's 5 not a matter of the cost of the lens. It's more a matter of 6 7 that particular type of lens using a single high magnification 8 optic. 9 Q. Are you finished? 10 Yes, I am. Α. 11 Okay. Let's ask it this way. Ο. 12 Using the lenses that you put in the box that you 13 sent to Mr. Carmack, was one of the problems with using those lenses that there was significant geometric distortion? 14 I mean, you -- you could describe it as a problem. 15 more that that's the fundamental aspect of the design. 16 I mean. 17 optics is basic -- optical design is essentially a matter of 18 trade-offs. You have to decide between things like wide field 19 of view, low weight and geometric distortion, chromatic 20 aberration. And it wasn't so much a problem that these lenses 21 had distortion that needed to be solved, that was the intent of 22 the design. 23 The intent of the design was to optimize the hardware 24 to be high performing -- high performing in the things that 25 could only be solved in hardware, so high field of view, low

- cost, lightweight and then to solve for other problems like geometric distortion in software.
- It -- it's not really a problem as much as just an innate characteristic of that design.
- Q. And that's a characteristic that needed to be solved using software, correct?
- 7 A. Well, it had been solved using software. I mean, like I 8 said, that was an innate part of the design. I designed the 9 headsets to -- explicitly to trade off having that distortion 10 against having high field of view and low cost.
- 11 Q. That trade-off resulted in significant geometric distortion, correct?
- 13 A. Well, I mean, that -- it's not that the trade-off resulted 14 in that. That is the trade-off. The trade-off is distortion 15 and these other characteristics all competing with each other
- 16 in one design.
- Q. Another problem with the lenses you chose to put in the device that went in the box was that those lenses had significant chromatic aberration, correct?
- A. They were actually pretty good. They were -- they were -they were actually asphere optics with pretty minimal chromatic
 aberration. I mean, that's why when we actually used the same
 lenses later for Gear VR prototypes, we never really bothered
 correcting for it because it wasn't a huge factor in those
 lenses.

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So chromatic aberration was actually pretty good in
those lenses, but again, it's not a problem with them so much
as just the trade off against the other -- other -- other
aspects of the design.
     And is it your testimony in this case that the geometric
distortion in the chromatic aberration problems were not
corrected using software that Mr. Carmack wrote?
     I mean, his -- his software did implement the correction
Α.
required to view properly through the Rift. I'm not testifying
otherwise. I don't think anyone is.
     So you would agree with me, then, that the software that
Mr. Carmack wrote to turn what was in the box into virtual
reality solved geometric distortion and chromatic aberration,
correct?
     Well, I would say that he implemented, not that he solved
    Many other people had done this and not just
it.
hypothetically. Even running on my headsets many people had
done this, so I wouldn't say that he solved the problem and
made it work. This was a working device. It had certain
characteristics you needed to write to and his software did
implement those -- those particular characteristics, but I
would not say that it was, you know, the thing that solved it
and made it work. It was something that other people -- it's
hard to say that you've solved the problem when you've
basically written a piece of software to work a certain way to
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Like, if you had an iPhone and it required that you use a certain line of code to initialize your application on the iPhone, you would not say, ah, you wrote an application that solved the problem of launching on an iPhone. You would say you implemented the code that you needed in order to run on an iPhone, and that's what -- not just John but other people also had done.

- Q. You didn't write any software to correct, one, geometric distortion; or two, chromatic aberration using the device that was put in the box, correct?
- A. No. I'm not a software engineer, but I had worked with teams that did implement those things, and we used third party utilities to correct for distortion as well.
- 15 Q. Well, were you here when Mr. Carmack testified about 16 massive fisheye distortion?
- 17 | A. Yes, I was.
- Q. And the massive fisheye distortion that Mr. Carmack was talking about was the distortion that existed when the device came out of the box, correct?
- 21 A. Yes, that's correct.
- 22 Q. And the solution to the massive fisheye distortion was
- 23 what Mr. Carmack added while he was at id, correct?
- 24 A. Again, you know, that's the whole point of the design.
- 25 It's designed specifically to have wide field of view, low cost

- and low weight, at the expense of high distortion. This was not a problem that was solved. It's an innate characteristic of the device.
 - Q. Perhaps you didn't understand my question.

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The solution to the massive fisheye distortion was a solution that Mr. Carmack added while he was at id to your device that came out of the box, correct?

A. I mean, if you want to ask it that way, no, it's not the solution. There's many ways to implement it -- implement geometric distortion correction. His software did have geometric distortion correction in it, and he did implement it in his own way. But you -- I would not say that is the solution to the problem.

Again, this is something that people had been doing for years with my devices. It was well known, well understood. What he did was -- I guess you could call it a solution, but you would not call it the solution to the problem, if I'm understanding you correctly.

- Q. The only solution that was in the prototype that went to E3 was a solution to massive fisheye distortion that
- 21 Mr. Carmack wrote while he was employed at id, correct?
- A. As far as I know, the only thing that he was using in his game was his code. I mean, he was at E3 showing off his game.

 I would assume that he used his code and not the distortion

25 correction that had been done by other people.

- 1 Q. HMD stands for head-mounted device, correct?
- 2 A. No, it does not.
- 3 Q. What does HMD stand for?
- 4 A. It generally stands for either head-mounted display or, in
- 5 | some military applications, helmet-mounted display.
- 6 Q. Okay. The headset that you sent to Mr. Carmack in the box
- 7 | didn't even have a strap, did it?
- 8 A. No, that unit did not.
- 9 Q. And it didn't have anything that mounted the display or
- 10 the device to the head, did it?
- 11 | A. Well, the -- I mean, the neoprene foam on there was part
- 12 of the facial interface, and it was designed to have a strap on
- 13 it. That particular unit just didn't have one on it, so no, I
- 14 | wouldn't say it didn't have anything to attach it to the head.
- 15 It just didn't actually have a head mounting device on that
- 16 particular unit.
- 17 Q. So if we took what came out of the box and held it up to
- 18 our face and turned loose of it, it wouldn't be mounted to my
- 19 head, would it? It would fall on the floor?
- 20 A. That's correct.
- 21 | Q. And there was no head tracker in the head-mounted display
- 22 in the box that you sent to Mr. Carmack, right?
- 23 A. Right.
- 24 Q. And a head tracker is what's used to sense when your head
- 25 moves, right?

- $1 \mid A.$ Yes.
- 2 Q. So if I have a head tracker and I move to the right, that
- 3 senses that my head has moved to the right, correct?
- 4 A. Yes. And that could be rotationally to the right or, you
- 5 know, translationally to right.
- 6 Q. And by translationally, that would be like if I did a step
- 7 to the side; is that correct?
- 8 A. Yes. And -- the sensor that John was using couldn't
- 9 detect translation, but I just want to be clear there's two --
- 10 moving to the right could mean one of two things, and there are
- 11 sensors that are able to do both.
- 12 | Q. And let's be clear. You said the sensor that John was
- 13 using, correct?
- 14 | A. Yes.
- 15 Q. That's Mr. Carmack, right?
- 16 A. Yes. I believe the Hillcrest Labs sensor.
- 17 | Q. And the sensor that you had in the box was none, correct?
- 18 A. No, I did not have a sensor on the -- on the unit that I
- 19 | sent him.
- 20 Q. Okay. So if we plugged in the unit that you put in the
- 21 box and we got, say, the screen from your computer to show up,
- 22 | correct?
- 23 | A. It would show up. It would be split between both eyes.
- 24 | The Rift wasn't designed to be used with a standard desktop or
- 25 | standard applications. You have to make applications that are

- 1 written specifically for it in order view them correctly.
- Q. And then if the user using the device as it came out of
- 3 | the box turned their head to the right, what would happen?
- 4 A. That entire -- that depends entirely on the application
- 5 | you would have attached and any -- and the sensor, if any, that
- 6 you had attached.
- 7 Q. Oh, but since there is no sensor -- I'm talking about as
- 8 it came out of the box from you. Using what came out of the
- 9 box from you, if I'm looking at something on my screen and I
- 10 turn my head to the right, does anything change?
- 11 A. It would depend on the application, but, you know,
- 12 generally no. If you hooked up an application that was not
- 13 hooked up to any kind of other motion tracker and it was just
- 14 running on the display, it would remain static.
- 15 Q. And so using your device as it came out of the box when
- 16 the user turns their head either to the right or to the left,
- 17 nothing changes because there is no sensor, correct?
- 18 A. Well, that is the case. I mean, you could say that about
- 19 most virtual reality displays. I mean, most virtual reality
- 20 displays are sold without a head tracker. I worked in
- 21 professional virtual reality before I --
- 22 Q. I'm not asking about most virtual reality displays. I'm
- 23 | talking about your display in the box.
- 24 A. Again, if you will give me just a moment.
- My point is that you say when this head-mounted

- 1 display is hooked up, nothing happens. I'm saying that is very
- 2 | typical of a head-mounted display. Typically, it does have to
- 3 be hooked up to two things. It needs a motion tracker, and it
- 4 needs an application that is designed to run on the
- 5 head-mounted display.
- If you don't have either of those things, then it's not going to do anything when you move your head.
- 8 Q. Okay. Are you finished?
- 9 A. Yes, I am.
- 10 Q. Okay. Now, I would like to focus you on the device you
- 11 put in the box and you sent to Mr. Carmack. Using just what
- 12 was in your prototype, can we agree that when you move your
- 13 head, nothing changes?
- 14 | A. Yes.
- 15 Q. And can't we also agree that a fundamental principle in
- 16 order for something to be considered virtual reality is when
- 17 you move your head, what you see changes?
- 18 A. If you're referring to the overall concept, yes. If
- 19 you're referring to, say, a virtual reality display or
- 20 | head-mounted display, I just want to be clear that, no, that is
- 21 not necessarily part of it.
- But as a system, including the software, the
- 23 | hardware, the motion tracking, yes, virtual reality requires
- 24 some form of head tracking.
- 25 Q. Otherwise, it is just a monitor mounted close to your

- 1 face, isn't it?
- 2 A. Not exactly. I mean, you still have a very wide field of
- 3 view. You still have the ability to display stereoscopic
- 4 images that are the same size and scale of the real world, and,
- of course, you are blocking out the outside world. So without
- 6 a head tracker you may not be able to call it virtual reality,
- 7 but it's certainly more full-featured than a monitor, which is
- 8 why so many companies have sold head-mounted displays without
- 9 head tracking. They are not VR devices, but they are much more
- 10 than just a monitor.
- 11 | Q. And you mentioned field of view. Let's talk about that
- 12 for a minute. Okay?
- 13 If I'm standing here and watching my television over
- 14 | there on the wall, my field of view is calculated from where
- 15 | I'm standing to where the television is, correct?
- 16 A. Yes. Usually in degrees.
- 17 Q. So let's say I'm 20 feet away from my television. I would
- 18 have a certain degree of field of view, correct?
- 19 A. Sure. Like if you had a regular-size television on that
- 20 | wall where you're standing, you might be seeing a 10- or
- 21 | 20-degree field of view horizontally.
- 22 | Q. If I wanted to increase the field of view from 10 or
- 23 | 20 degrees up to 40 or 50 degrees, I could just walk toward the
- 24 TV, correct?
- 25 A. Yes, you could.

- Q. And if I wanted to increase it up to 170 degrees, even though I encourage my children not to do this, I could walk all the way up to TV, correct?
 - A. There are other practical limitations, like viewing angles, that would make that probably not practical. Like, if you stand right next to a display, the angle that the panel can display proper colors is going to be off, so it wouldn't work. But, generally speaking, yeah. Not all the way up to 170 but maybe up to -- maybe, let's say 90 degrees or 100 degrees or something like that it would work.
 - Q. So when we talk about field of view, another way of thinking about that is how close we are to the TV, right?

 A. Not exactly. Getting closer to the TV doesn't just make it larger. It also means that you're having to focus much closer.

So with a virtual reality device, you're generally collimating the light and refocusing it in a certain plane. So with the TV that you are standing right next to -- let's say you are standing right next to a small TV and getting a 100-degree field of view, your eyes are going to be converging on the TV up close and also focusing on the TV up close.

with a virtual reality device, generally speaking, that's not the case. The -- the image is reprojected out at least a few meters, sometimes out to infinity. So that's really the big difference.

- 1 Like, in terms of just the degrees of field of view,
- 2 yes, you will get more degrees, but all of the other
- 3 characteristics of vision, there is a big difference between a
- 4 head-mounted display and just standing close to a TV.
- 5 | Q. So if we're just talking about a field of view, we could
- 6 | increase our field of view by walking closer to the TV,
- 7 | correct?
- 8 A. Yes.
- 9 Q. Thank you.
- 10 Now, were you at E3 when what was in the box was
- 11 | displayed after Mr. Carmack's modifications?
- 12 A. No, I was not.
- 13 | Q. Do you have any knowledge about what was displayed at E3?
- 14 | A. I do.
- 15 Q. Mr. Carmack's presentation at E3 took what you sent him in
- 16 | the box, added hardware, correct?
- 17 A. Yes. He attached a Hillcrest sensor and also a Scott ski
- 18 goggle strap, I believe.
- 19 Q. He also added software, correct?
- 20 A. I wouldn't say he added software to the device I sent
- 21 | them. I would say he ran that software on that device. I
- 22 understand it's semantic, but it's important.
- 23 Q. And the software that Mr. Carmack ran in connection with
- 24 | the device used the input from the sensors that he had added to
- 25 change what you saw when you moved your head, correct?

- 1 A. Exactly.
- Q. So the device that you sent in the box wouldn't change
- 3 when you moved your head, and Mr. Carmack fixed that, correct?
- 4 A. He -- again, it's not a problem with a head-mounted
- 5 display that you fix, it not having a motion sensor. This is
- 6 why I took pains earlier to point out that most of the
- 7 | head-mounted displays, you have to have a motion sensor.
- 8 You keep saying this is a problem he fixed. What I'm
- 9 | saying is he wrote a piece of software that used head tracking
- 10 and HMD. That's not fixing a problem with the HMD. That's
- 11 choosing to display software with head tracking, which, again,
- 12 I did not have a head tracker on the unit that I sent to John
- 13 in that box.
- 14 | Q. Let me try it a different way. If you quibble with the
- 15 | word "problem," let's call it feature. A feature of what you
- 16 put in the box was when you moved your head, nothing changed,
- 17 | correct?
- 18 A. Well, no, you wouldn't say that either. If something
- 19 doesn't do something, you don't call it a feature. It's not a
- 20 | quibble with the term "problem"; it is problem and then fixing.
- 21 | I'm saying it is not a problem that was fixed.
- 22 You know, if -- if you were to make a rectangular
- 23 | image that displayed on a TV and you wanted to show a certain
- 24 | thing, you wouldn't say that it solved the problem of showing a
- 25 | rectangular image. You would say, oh, well, you know, you did

1 it the way you wanted to do it.

John wanted to show a piece of software that utilized head tracking, and so he attached a head tracker, but that was not a problem that was fixed with my device.

- Q. I understand.
- Mr. Carmack added the feature of tracking head movement and changing what you see in the display based on the head movement, correct?
- 9 A. Yes, I would agree with that.
- 10 | Q. Because your device didn't have it, correct?
- $11 \mid A$. The one that I sent in the box did not have it, that's
- 12 correct.

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- 13 Q. You had no input on the choice of head trackers that
- 14 Mr. Carmack used, did you, sir?
- 15 A. No, I was aware that he was using the Hillcrest tracker.
- 16 | I don't think I ever gave him any feedback that he should use
- 17 anything else. But we did discuss head tracking on the MTBS3D
- 18 forums on several other things.
- 19 Q. You didn't tell Mr. Carmack which head tracker to choose
- 20 on the device he used at E3, did you, sir?
- 21 A. No, I did not.
- 22 Q. And Mr. Carmack wrote software code for head and neck
- 23 model for the device that was shown at E3, correct?
- 24 A. Well, a head and neck model was more related -- it is in
- 25 the software, and it is relating to actually, basically, the

- relationship between your neck, your head, and how you move than anything with the HMD.
- So his software did have a head and neck model, but I wouldn't say that it was for the HMD.
- Q. There was no head and neck modeling software in the box when you sent it to Mr. Carmack, correct?
- 7 A. That's correct.
- Q. And at E3 there was head and neck modeling software used
 with the demonstration at E3, correct?
- 10 A. That's correct.
- 11 | Q. So from the time he received the box till the time it got
- 12 to E3, any head and neck modeling was done by Mr. Carmack,
- 13 | correct?
- 14 A. I mean, in his software. I don't want to say that he was
- 15 the only one doing -- that any head and neck modeling was done
- 16 by him. It's a concept that has been well understood and used
- 17 in the virtual reality industry for decades, but in his
- 18 particular demo, as far as I know, he was the only one
- 19 implementing head and neck modeling.
- 20 Q. And there was also distortion correction software in the
- 21 demonstration at E3, correct?
- 22 A. Yes.
- 23 Q. And there was no distortion correction software code in
- 24 | your box when you sent it to Mr. Carmack, correct?
- 25 A. That's correct.

- 1 Q. So any distortion correction source code that was used in
- 2 the demonstration at E3 came from Mr. Carmack while he was at
- 3 id, correct?
- 4 A. I assume so.
- 5 Q. You don't have any reason to testify any other way, do
- 6 you?
- 7 | A. No, I don't.
- 8 Q. And you didn't write any of the distortion correction code
- 9 | that Mr. Carmack used at E3, did you, sir?
- 10 A. No, I did not.
- 11 | Q. In fact, you didn't give Mr. Carmack any software that he
- 12 used when demonstrating a headset at E3 in 2012 other than what
- 13 may have been on the video card when you bought it, correct?
- 14 A. The display control board, yes.
- 15 Q. And would you agree with me, sir, that it was only with
- 16 the additions from Mr. Carmack, including motion sensing and
- 17 | software, did the headset at E3 actually provide a virtual
- 18 reality experience?
- 19 | A. Yes.
- 20 Q. The E3 demonstration was shown in ZeniMax's booth,
- 21 | correct, sir?
- 22 A. It was either a booth or a meeting room. I'm not sure.
- 23 Q. And is it your understanding that the E3 demonstration was
- 24 shown by special appointments only?
- 25 A. I was -- I was told that he would be showing -- that he

- 1 had a few private demos that he wanted to give. My
- 2 recollection is that it's by appointment, but I don't really
- 3 know one way or the other.
- 4 | Q. Because you weren't there, right?
- 5 A. That's right.
- 6 Q. But you knew ahead of time that Mr. Carmack was going to
- 7 | show a demonstration of the headset that he had written
- 8 | software for and modified at E3, correct?
- 9 A. He told me that he was going to be giving a few private
- 10 demonstrations, and he had given one or two to outlets actually
- 11 before E3 as well, so I was aware.
- 12 Q. Would you agree that Mr. Carmack's demonstration of the
- 13 headset that he added hardware and software to while he was at
- 14 | id garnered widespread media attention?
- 15 A. Yes, I would.
- $16 \mid \mathsf{Q}.$ Would you agree with "that demonstration was a
- 17 breakthrough moment in virtual reality technology"?
- 18 A. Not necessarily. I guess you could call it a breakthrough
- 19 moment maybe in awareness. I don't -- I don't know if it would
- 20 be properly considered a breakthrough moment in the technology.
- 21 Q. Now, prior to E3, you hadn't met Mr. Iribe, had you?
- 22 A. No.
- 23 | Q. And you hadn't met -- hang on -- any of the other founders
- 24 of Oculus; is that correct?
- 25 A. That's correct.

- 1 Q. You didn't arrange for any of the press interviews with
- 2 Mr. Carmack leading up to E3, correct?
- 3 A. No.
- 4 Q. And prior to E3, you hadn't met Nate Mitchell or
- 5 Mr. Antonov, correct?
- 6 A. That's correct.
- 7 | Q. You didn't pay for any of the booth space at E3 that
- 8 Mr. Carmack demonstrated the headset as he had modified it,
- 9 | correct?
- 10 A. No. That was their booth.
- 11 | Q. And you didn't discuss with Mr. Carmack in advance how the
- 12 demonstration should be run at E3 in 2012, did you, sir?
- 13 A. I mean, we did discuss it. Not in any kind of, you know,
- 14 detail, but we -- we did discuss what he was going to be doing
- and how they would be given. I -- I was certainly not telling
- 16 him how to show off his game.
- 17 Q. Can we agree that you didn't write any of the software on
- 18 the device that Mr. Carmack demonstrated at E3 that garnered so
- 19 | much media attention?
- 20 A. Just to be clear, there wasn't -- there was software that
- 21 was viewed through the device. It was not software necessarily
- 22 on the device, but --
- 23 Q. All right.
- 24 A. -- but I just want to make sure we understand each other.
- But, no, I did not write any of the software that was

- 1 being shown on the device at E3.
- 2 Q. Let me rephrase.
- 3 Mr. Carmack did a demonstration at E3, correct?
- 4 | A. Yes.
- 5 | Q. And in order to do that demonstration, it required
- 6 | software, correct?
- 7 | A. I mean, the demonstration was of software, so yes.
- 8 Q. And you didn't write any of the software that was used in
- 9 the demonstration at E3, correct?
- 10 A. That is correct.
- 11 | Q. And you would agree with me, wouldn't you, sir, that
- 12 Mr. Carmack demonstrated something at E3 in 2012 that did not
- 13 come exclusively from you, correct?
- 14 A. Yes, that's correct.
- 15 Q. You would agree with me, wouldn't you, sir, that software
- 16 was the most difficult aspect of the Rift to implement at that
- 17 | time?
- 18 A. That phrase regarding the context really depends. I mean,
- 19 if you're talking about creating a game, then certainly. If
- 20 you're talking about making a product, I would take issue with
- 21 that. I would say the hardware side is very difficult if
- 22 you're talking about actually making a product that you can get
- 23 to people.
- 24 | I would have to know the context of that to know
- 25 whether I agreed with it or not.

- 1 Q. You're not a software guy, are you?
- 2 A. No. I think of myself as a hardware guy.
- 3 Q. And, in fact, you would never call yourself a software
- 4 person, correct?
- 5 A. You know, again, that would depend on who I'm talking to.
- 6 To my friends and family, I'm very much the software guy. I'm
- 7 the computer guy. I'm the guy who knows all about software.
- 8 But in relation to people like John Carmack, no, I'm definitely
- 9 not a software guy. My focus is very much on the hardware side
- 10 of things even though I do know a bit about software.
- 11 | Q. Have you publicly stated that you're not a software guy?
- MS. WILKINSON: Your Honor -- objection, asked and
- 13 answered.
- 14 THE COURT: Sustained.
- 15 BY MR. PHILBIN:
- 16 | Q. You don't consider yourself a programmer, do you, sir?
- 17 A. No, I do not. My -- my -- I've done some programming, but
- 18 | I definitely would not consider myself a programmer. And it's
- 19 | not my passion.
- 20 | Q. And programming is not even one of your core competencies,
- 21 correct?
- 22 A. No, it is not.
- 23 | Q. You'd consider yourself more of a hardware person,
- 24 | correct?
- 25 A. That's right.

- 1 Q. And, in fact, before Mr. Carmack saw your work, you
- 2 considered yourself a hobbyist working on your own stuff,
- 3 | correct?
- 4 A. I was a hobbyist. I was also an engineer working at a
- 5 | university VR research lab, but, I mean, it is true that I'm a
- 6 | hobbyist. I just want to make sure that we're not
- 7 | characterizing that as the only thing I thought of myself as.
- 8 I was also working professionally on virtual reality hardware.
- 9 Q. And haven't you characterized it as you felt blessed to
- 10 hear from John Carmack at id to use what you put in the box?
- 11 | A. I'm not sure if I said "blessed" in relation to that, but
- 12 generally, yes, I -- that sounds like something I might've
- 13 said.
- 14 Q. All right. You signed an NDA in this case, didn't you,
- 15 | sir?
- 16 A. I signed an NDA independently of this case. It's now part
- 17 of this case, yes.
- 18 MR. PHILBIN: Okay. Can we pull up PX2, Mr. Frank?
- 19 Can we go to page 3?
- 20 BY MR. PHILBIN:
- 21 Q. Start right here. This is a nondisclosure agreement,
- 22 correct?
- 23 | A. Yes.
- 24 MR. PHILBIN: And can we scan down to the bottom,
- 25 Mr. Frank? I believe it's page 6.

- 1 BY MR. PHILBIN:
- 2 Q. Is that your signature there on the right of page 6 of
- 3 PX2?
- 4 A. Yes, it is.
- 5 Q. No one signed that on your behalf, correct?
- 6 A. No, it was me.
- 7 | Q. And prior to signing PX2, you read it and understood it,
- 8 | correct?
- 9 | A. I did.
- 10 MR. PHILBIN: Mr. Frank, could we go back up to the
- 11 | top on the recitals?
- 12 BY MR. PHILBIN:
- 13 Q. While we're doing that, you understood the purpose of the
- 14 | NDA was to call things out as confidential and keep them
- 15 protected as confidential, correct?
- 16 A. That's correct.
- 17 Q. And you understood the purpose of a nondisclosure
- 18 agreement at the time you signed it, didn't you, sir?
- 19 A. I did.
- 20 Q. And the first purpose is in the name, nondisclosure,
- 21 correct?
- 22 A. Yes.
- 23 | Q. And the very purpose of entering into a nondisclosure
- 24 agreement is to get someone's agreement that you're going to
- 25 share information with that they promise not to disclose it,

- 1 correct?
- 2 A. Yes.
- 3 Q. And you take NDA or nondisclosure agreements seriously,
- 4 don't you, sir?
- 5 A. I take them very seriously.
- 6 Q. And you understood at the time you signed Exhibit 2, the
- 7 | nondisclosure agreement in this case, that it was a binding
- 8 | contract with ZeniMax, didn't you, sir?
- 9 A. Yes, I did.
- 10 Q. And in entering into a binding contract, it's very
- 11 | important to understand what you're signing, correct, sir?
- 12 A. Yes.
- 13 Q. And did you treat the nondisclosure agreement that you
- 14 | signed with ZeniMax with the same scrutiny and seriousness that
- 15 you've treated other NDA's you've signed?
- 16 A. I don't know if I treated it with the same -- for example,
- 17 I've signed nondisclosure agreements to get access to, like,
- 18 beta testing for video games online, and, you know, you don't
- 19 generally read those. You just scroll through, click okay, and
- 20 you don't share with anybody.
- 21 I'd say I treated this one probably more seriously
- 22 than other NDAs that I had signed in the course of, you know,
- 23 clicking the terms of service on stuff in the past.
- 24 | Q. Would you agree that the nondisclosure agreement you
- 25 | signed in this case was one you treated with the highest level

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of sincerity?
1
    A. Yes, I was completely sincere.
2
               THE COURT: All right. This is a good stopping
 3
    point.
4
 5
               Don't talk about the case.
               Be back at 9:00.
6
               See y'all in the morning.
 7
               SECURITY OFFICER: All rise.
8
9
               (Jury out)
               (Recessed for the day at 4:37)
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I, TODD ANDERSON, United States Court Reporter for the United States District Court in and for the Northern District of Texas, Dallas Division, hereby certify that the above and foregoing contains a true and correct transcription of the proceedings in the above entitled and numbered cause. WITNESS MY HAND on this 17th day of January, 2017. /s/Todd Anderson TODD ANDERSON, RMR, CRR United States Court Reporter 1100 Commerce St., Rm. 1625 Dallas, Texas 75242 (214) 753-2170